CITY OF NEWTON PURCHASING DEPARTMENT

CONTRACT FOR PUBLIC WORKS - UTILITIES DIVISION (M.G.L. Ch. 30, Sec. 39m)

PROJECT MANUAL: FURNISH & INSTALL WASTEWATER PUMP No.1 AT LONGFELLOW ROAD PUMP STATION INVITATION FOR BID #10-03

JULY 2009

David B. Cohen, Mayor

CITY OF NEWTON, MASSACHUSETTS

PURCHASING DEPARTMENT

purchasing@newtonma.gov Fax (617) 796-1227

August 7, 2009

ADDENDUM #1

INVITATION FOR BID #10-03

FURNISH & INSTALL WASTEWATER PUMP #1 AT LONGFELLOW ROAD

THIS ADDENDUM IS TO:

Announce that the City is canceling this Invitation for Bid

All other terms and conditions of this bid remain unchanged

PLEASE ENSURE THAT YOU ACKNOWLEDGE THIS ADDENDUM ON YOUR BID FORM

Thank you.
Jennifer Hill
Acting Department Head

CITY OF NEWTON PROJECT MANUAL TABLE OF CONTENTS PUMP STATION REPAIRS LONGFELLOW ROAD PUMP STATION

		No. Pages
Cover F Fable of	Page f Contents	1 1
Part 1 -	Bidding Documents, Contract Forms, and Conditions of the Contract	
1.	- Invitation for Bid	1
2.	- Instructions to Bidders	3
3.	- Bid Form	2
4.	- Bidder's Qualification Forms	
	 Bidders Qualification Form and References 	2
5.	 Contract Forms (Informational only. Not required at time of bid submittal) Owner - Contractor Contract Certificate of Authority - Corporate Attestation Payment Bond 	2 1 1 1
6.	- General Conditions of the Contract	6
7.	 Wage Rate Requirements Department of Labor Minimum Wage Rates Statement of Compliance Weekly Payroll Report Form 	14
Part 2	2 - General Requirements and Project Specifications	
1. 2.	Special ConditionsContract Specifications	3
	 Section 01270 – Measurement and Payment 	1
	 Section 01014 – Scope and Sequence of Work 	2
	 Section 11310 – Wastewater Pumping Equipment 	9
	 Section 01752 – Start Up and Testing 	2

END OF SECTION

CITY OF NEWTON PURCHASING DEPARTMENT INVITATION FOR BID# 10-03

The City of Newton invites sealed bids from Contractors for

FURNISH & INSTALL WASTEWATER PUMP NO. 1 AT LONGFELLOW ROAD PUMP STATION

Bids will be received until: 9:30 a.m. on August 13, 2009

at the Purchasing Department, Room 204, Newton City Hall, 1000 Commonwealth Ave., Newton, MA 02459. Immediately following the deadline for bids all bids received within the time specified will be publicly opened and read aloud.

The work under this contract shall consist of: BASE BID: remove and replace existing wastewater pump and motor #1 at the Longfellow Road Pump Station, Newton, MA and all appurtenances as specified. ALTERNATE #1, if funding allows, remove existing starter from pump #1 install new 150-horsepower adjustable frequency drive above the existing motor control center.

There will be no charge for contract documents. All bids must be accompanied by a bid deposit in an amount that is not less than five percent (5%) of the value of the bid, <u>including</u> all add alternates.

All bids must be submitted with one ORIGINAL and one COPY. Project Manual will be available online at **www.ci.newton.ma.us/bids** or for pickup at the Purchasing Office after 10:00 a.m., July 30, 2009.

All bids are subject to the provisions of M.G.L. Chapter 30, Section 39M. Wages are subject to minimum wage rates determined by the Massachusetts Department of Labor and Industries pursuant to M.G.L. Chapter 149, Sec. 26 to 27H. The schedule of wage rates applicable to this contract is included in the bidding documents. In addition, the prevailing wage schedule will be updated annually for all public construction projects lasting longer than one (1) year. You will be required to pay the rates set out in any updated prevailing wage schedule. Increases in prevailing wage schedules will not be the basis for change order requests. The successful bidder will be required to provide a Certificate of Insurance demonstrating current coverage of the type and amounts set forth in the Project Manual. The successful bidder will be required to furnish a Labor and Materials Payment Bond in the amount of 50% of the contract total.

Award will be made to the bidder with the lowest responsive and eligible bid.

Time is of the essence in the performance of the work of this contract. Bidders attention is directed to the time for completion stated in the Project Manual and the provisions regarding the assessment of liquidated damages for failure to complete the work within the time specified of **three hundred sixty (360) calendar days**.

It is the sole responsibility of the contractor downloading these bids to ensure they have received any and all addenda prior to the bid opening. Addenda's will be available online www.ci.newton.ma.us/bids within the original bid document as well as a separate file. If you download bids from the internet site and would like to make it known that your company has done so, you may fax the Purchasing Dept. (617) 796-1227 or emaile purchasing@newtonma.gov with your NAME, ADDRESS, PHONE, FAX AND INVITATION FOR BID NUMBER..

The City of Newton's Purchasing Dept. will convert to an email notification system of all upcoming public bids effective July 1, 2009. If you wish to receive notification of bids, please email us your company information to purchasing@newtonma.gov, otherwise you may view all City of Newton public bids online at www.ci.newton.ma.us/bids.

The City of Newton reserves the right to waive any informalities in any or all bids, or to reject any or all bids, if it be in the public interest to do so.

CITY OF NEWTON

Re Cappoli Chief Procurement Officer

July 30, 2009

CITY OF NEWTON DEPARTMENT OF PURCHASING INSTRUCTIONS TO BIDDERS

ARTICLE 1 - BIDDER'S REPRESENTATION

- 1.1 Each General Bidder (hereinafter called the "Bidder") by making a bid (hereinafter called "bid") represents that:
 - 1. The Bidder has read and understands the Contract Documents and the bid is made in accordance therewith.
 - 2. The Bidder has visited the site and is familiar with the local conditions under which the Work has to be performed.
- 1.2 Failure to so examine the Contract Documents and site will not relieve any Bidder from any obligation under the bid as submitted.

ARTICLE 2 - REQUEST FOR INTERPRETATION

- 2.1 Bidders shall promptly notify the City of any ambiguity, inconsistency, or error which they may discover upon examination of the Contract Documents, the site, and local conditions.
- 2.2 Bidders requiring clarification or interpretation of the Contract Documents shall make a written request to the *Chief Procurement Officer*, at purchasing@newtonma.gov or via facsimile (617) 796-1227. The City will answer such requests if received seven (7) calendar days before the date for receipt of the bids.
- 2.3 Interpretation, correction, or change in the Contract Documents will be made by Addendum which will become part of the Contract Documents. The City will not be held accountable for any oral instruction.
- 2.4 Addenda will be faxed or mailed First Class postage by the USPS, to every individual or firm on record as having taken a set of Contract Documents.
- 2.5 Copies of addenda will be made available for inspection at the location listed in the Invitation for Bids where Contract Documents are on file, in addition to being available online at www.ci.newton.ma.us/bids.
- Bidders downloading information off the internet web site are soley responsible for obtaining any addenda prior to the bid opening. If the bidder makes themselves known to the Purchasing Dept., at purchasing@newtonma.gov or via facsimile (617) 796-1227, they shall be placed on the bidder's list. Bidders must provide the Purchasing dept. with their company's name, street address, city, state, zip, phone, fax and INVITATION FOR BID NUMBER# 10-03.

ARTICLE 3 - MBE PARTICIPATION

- 3.1 By bidding on this project each Bidder certifies its intent to comply with the City of Newton Minority/Women Business Enterprise Plan dated December 1999 to further expand business opportunities for minority firms. A copy of this plan is incorporated in the Project Manual.
- 3.2 Bidders are advised that the City of Newton Supplemental Equal Employment Opportunity Anti-Discrimination and Affirmative Action Program is applicable to all construction contracts in excess of \$50,000.00. A copy of this program is incorporated in the Project Manual. A Contractor's Certification form must be signed by all successful low bidders prior as a condition of contract award. No contract shall be executed or valid unless the contractor has executed and submitted the Contrctor's Certification. (see Attachment B to the Supplemental Equal Employment Opportunity Anti-Discrimination and Affirmative Action Program.)
- 3.3 The awarded bidder shall, prior to the award of any sub-contract, obtain from each of its sub-contractors the Sub-Contractors Certification certifying the Sub-Contractor shall comply with the minority manpower ratio and specific affirmative action steps described in the Supplemental Equal Employment Opportunity Anti-Discrimination and Affirmative Action Program contained in the Project Manual. (see Attachment C to the Supplemental Equal Employment Opportunity Anti-Discrimination and Affirmative Action Program.)

ARTICLE 4 - PREPARATION AND SUBMISSION OF BIDS

- 4.1 Bids shall be submitted on the "Bid Form" as appropriate, furnished by the City.
- 4.2 All entries on the Bid Form shall be made by typewriter or in ink.
- 4.3 Where so indicated on the Bid Form, sums shall be expressed in both words and figures. Where there is a discrepancy between the bid sum expressed in words and the bid sum expressed in figures, the words shall control.
- 4.4 Bid Deposits shall be submitted in the amount specified in the Invitation for Bids. They shall be made payable to the City of Newton and shall be either in the form of cash, certified check, treasurer's or cashier's check issued by a responsible bank or trust company, or a bid bond issued by a surety licensed to do business in the Commonwealth of Massachusetts; and shall be conditioned upon the faithful performance by the principal of the agreements contained in the bid.
 - Bid deposits of the three (3) lowest responsible and eligible Bidders shall be retained until the execution and delivery of the Owner/Contractor agreement.
- 4.5 The Bid, including the bid deposit shall be enclosed in a sealed envelope with the following plainly marked on the outside:
 - * GENERAL BID FOR:
 - * NAME OF PROJECT AND INVITATION NUMBER
 - * BIDDER'S NAME, BUSINESS ADDRESS, AND PHONE NUMBER
- 4.6 Date and time for receipt of bids is set forth in the Invitation for Bids.
- 4.7 Timely delivery of a bid at the location designated shall be the full responsibility of the Bidder.
- 4.8 Bids shall be submitted with one original and one copy.
- 4.9 The use of a company or brand name, except with software, in the specifications is intended solely for the purpose of describing a standard of quality, functional features and performance standards required and is not intended to limit or restrict competition. The bidder offering a product which they deem equal to the brand and model specified in the solicitation provided that the brand name specified is not followed by the words "no sbustitutions", shall indicate so on the bid form and Minimum Requirements Exception form and submit with their bid the manufacturers specifications/descriptive literature for the product they are offering. Failure to submit manufacturers specifications/descriptive literature with bids may be cause for bid rejection.
 - "Equality" An item equal to that named or described in the specifications of the contract may be furnished by the Vendor and the naming of any commercial name, trademark or other identification shall not be construed to exclude any item or manufacturer not mentioned by name or as limiting competition but shall establish a standard of equality only. An item shall be considered equal to the item so named or described if (1) it is at least equal in quality, durability, appearance, strength and design; (2) it will perform at least equally the function imposed by the general design for the work being contracted for or the material being purchased; and (3) it conforms substantially, even with deviations, to the detailed requirements for the item in the specifications. The name and identification of all materials other than the one specifically named shall be submitted to the City in writing for approval, at time of bid, use or fabrication of such items. Subject to the provisions of M.G.L., Ch. 30, Sec. 39J, approval shall be at the sole discretion of the City, shall be in writing to be effective, and the decision of the City shall be final. The City may require tests of all materials so submitted to establish quality standards at the Vendor's expense. All directions, specifications and recommendations by manufacturers for installation, handling, storing, adjustment and operation of their equipment shall be complied with; responsibility for proper performance shall continue to rest with the Vendor.
- 4.10 Be advised that a new Massachusetts law has been enacted that required all employees who work on Massachusetts public works construcion sites must have no less than 10 hours of OSHA-approved safety and health training. See Chapter 306 of the Acts of 2004, which will become effective July 1, 2006.
 - 1. This requirement will apply to any general bid or sub bid submitted on or after July 1, 2006 and to any contract awarded on or after July 1, 2006.
 - 2. This law directs the Massachusetts Attorney General to restrain the award of construction contracts to any contractor who is in violation to this requirement and to restrain the performance of these contracts by non-complying contractors.

3. The contractor and all subcontractors on this project will be required to provide certification of compliance with this requirement. Non-compliance with this new Massachusetts Law will disquality you from bidding on public contracts.

ARTICLE 5 - ALTERNATES

- 5.1 Each Bidder shall acknowledge Alternates (if any) in Section C on the Bid Form.
- In the event an Alternate does not involve a change in the amount of the base bid, the Bidder shall so indicated by writing "No Change", or "N/C" or "0" in the space provided for that Alternate.
- 5.3 Bidders shall enter on the Bid Form a single amount for each Alternate which shall consist of the amount for work performed by the Contractor.
- 5.4 The low Bidder will be determined on the basis of the sum of the base bid and the accepted alternates.

ARTICLE 6 - WITHDRAWAL OF BIDS

- Any bid may be withdrawn prior to the time designated for receipt of bids on written or telegraphic request. Telegraphic withdrawal of bids must be confirmed over the Bidder's signature by written notice postmarked on or before the date and time set for receipt of bids.
- 6.2 Withdrawn bids may be resubmitted up to the time designated for the receipt of bids.
- 6.3 No bids shall be withdrawn for sixty days, Saturdays, Sundays and legal holidays excluded, after the opening of the bids.

ARTICLE 7 - CONTRACT AWARD

- 7.1 The City of Newton will award the contract to the lowest eligible and responsible Bidder within sixty days, Saturdays, Sundays, and legal holidays excluded after the opening of bids.
- 7.2 The City of Newton reserves the right to waive any informalities in or to reject any or all Bids if it be in the public interest to do so.
- As used herein, the term "lowest responsible and eligible Bidder" shall mean the Bidder (1) whose bid is the lowest of those bidders possessing the skill, ability and integrity necessary for the faithful performance of the work; (2) who shall certify that he is able to furnish labor that can work in harmony with all other elements of labor employed or to be employed in the work; (3) who, where the provisions of section eight B of chapter twenty-nine apply, shall have been determined to be qualified thereunder.
- 7.4 It is the purpose of the City not to award this contract to any bidder who does not furnish evidence satisfactory to the Chief Procurement Officer that he has the ability and experience in this class of work and that he has sufficient capital and plant to enable him to prosecute the same successfully and to complete it within the specified time and that he will complete it in accordance with the terms thereof.
- 7.5 Subsequent to the award and within five (5) days, Saturday, Sundays and legal holidays excluded, after the prescribed forms are presented for signature, the successful Bidder shall execute and deliver to the City a Contract in the form included in the Contract Documents in such number of counterparts as the City may require.
- 7.6 In the event that the City receives low bids in identical amount from two or more responsive and responsible Bidders, the City shall select the successful Bidder by a blind selection process such as flipping a coin or drawing names from a hat. The low Bidders who are under consideration will be invited to attend and observe the selection process.

ARTICLE 8 - TAXES

- 8.1 The Bidder shall not include in this bid any tax imposed upon the sale or rental of tangible personal property in this Commonwealth, such as any and all building materials, supplies, services and equipment required to complete the work.
- The City is exempt from payment of the Massachusetts Sales Tax, and the Bidder shall not include any sales tax on its bid. The City's exemption Number is E-046-001-404.

CITY OF NEWTON

DEPARTMENT OF PURCHASING

BID FORM 10-03

A. The undersigned proposes to furnish all labor and materials required in accordance with the Contract Documents supplied by the City of Newton entitled:

LONGFELLOW ROAD PUMP STATION REPAIRS

	for the contract price specified below, subject to additions and deduction according to the terms of the specifications.	
В.	This bid includes addenda number(s),,,	
C.	The proposed contract price is:	
	BASE BID: remove/replace pump & motor #1	
	DOLLARS (\$).	
	ALTERNATE #1: replace starter from motor #1	
	DOLLARS (\$).	
	COMPANY:	
D.	The undersigned has completed and submits herewith the following documents:	
	☐ Bid Form - signed, 2 pages	
	☐ Bidder's Qualification Form and References, 2 pages	
	☐ 5% Bid Surety	
Е.	The undersigned agrees that, if s/he is selected as general contractor, s/he will within five days, Saturdays, Sundays at	nd

the premiums for which are to be paid by the general contractor and are included in the contract price.

legal holidays excluded, after presentation thereof by the awarding authority, execute a contract in accordance with the terms of this bid and furnish a labor and materials or payment bond, each of a surety company qualified to do business under the laws of the commonwealth and satisfactory to the awarding authority and each in the sum of the contract price,

The undersigned hereby certifies that s/he is able to furnish labor that can work in harmony with all other elements of labor employed or to be employed on the work and that s/he will comply fully with all laws and regulations applicable to awards made subject to section forty-four A of M.G.L. Chapter 30, s 39M.

The undersigned certifies that he is able to furnish labor that can work in harmony with all other elements of labor employed or to be employed in the work; (2) that all employees to be employed at the worksite will have successfully completed a course in construction safety and health approved by the United States Occupational Safety and Health Administration ("OSHA") that is at least 10 hours in duration at the time the employee begins work and who shall furnish documentation of successful completion of said course with the first certified payroll report for each employee; and (3) that all employees to be employed in the work subject to this bid have successfully completed a course in construction safety and health approved by the United States OSHA that is at least 10 hours in duration. The undersigned understands that any employee found on a worksite subject to this section without documentation of successful completion of a course in construction safety and health approved by the United States Occupational Safety and Health Administration that is at least 10 hours in duration shall be subject to immediate removal.

The undersigned further certifies under the penalties of perjury that this bid is in all respects bona fide, fair and made without collusion or fraud with any other person. As used in this subsection the word "person" shall mean any natural person, joint venture, partnership, corporation or other business or legal entity. The undersigned further certifies under penalty of perjury that the said undersigned is not presently debarred from doing public construction work in the Commonwealth under the provisions of section twenty-nine F of chapter twenty-nine, or any other applicable debarment provisions of any other chapter of the General Laws or any rule or regulation promulgated thereunder.

Date	
	(Name of General Bidder)
	BY:
	(Printed Name and Title of Signatory)
	(Business Address)
	(City, State, Zip)
	/
	(Telephone) (FAX)
	-
	(E-mail address)

NOTE: If the bidder is a corporation, indicate state of incorporation under signature, and affix corporate seal; if a partnership, give full names and residential addresses of all partners; if an individual, give residential address if different from business address; and, if operating as a d/b/a give full legal identity. Attach additional pages as necessary.

END OF SECTION

CITY OF NEWTON

BIDDER'S QUALIFICATIONS AND REFERENCES FORM

All questions must be answered, and the data given must be clear and comprehensive. Please type or print legibly. If necessary, add additional sheet for starred items. This information will be utilized by the City of Newton for purposes of determining bidder responsiveness and responsibility with regard to the requirements and specifications of the Contract.

FIRM NAME:		
WHEN ORGANIZ	ZED:	
INCORPORATED	D? Í YES Í NO DATE AND STATE OF INCORPORATION:	_
LIST ALL CONTE	RACTS CURRENTLY ON HAND, SHOWING CONTRACT AMOUNT AND A	NTICIPAT
HAVE YOU EVEN	ER FAILED TO COMPLETE A CONTRACT AWARDED TO YOU?	
IF YES, WHERE A	AND WHY?	
HAVE YOU EVER IF YES, PROVIDE	ER DEFAULTED ON A CONTRACT? Î YES Î NO DE DETAILS.	
LIST YOUR VEH	HICLES/EQUIPMENT AVAILABLE FOR THIS CONTRACT:	
IN THE SPACES F	FOLLOWING, PROVIDE INFORMATION REGARDING CONTRACTS	
COMPLETED BY MINIMUM OF FO	Y YOUR FIRM SIMILAR IN NATURE TO THE PROJECT BEING BID. A FOUR (4) CONTRACTS SHOULD BE LISTED. PUBLICLY BID CONTRACTS D, BUT NOT MANDATORY.	
	3:	
	NT: \$ DATE COMPLETED:	

PUBLICALY BID? YES NO				
TYPE OF WORK?:				
CONTACT PERSON:	TELEPHONE #: ()			
CONTACT PERSON'S RELATION TO PROJECT?: _				
(i.e., contract manager, purchasing agent, etc.)				
				
PROJECT NAME:				
OWNER:				
CITY/STATE:				
DOLLAR AMOUNT: \$	DATE COMPLETED:			
PUBLICALY BID? ÎYES Î NO				
TYPE OF WORK?:				
CONTACT PERSON:	TELEPHONE #: ()			
CONTACT PERSON'S RELATION TO PROJECT?: _				
(i.e., contract manager, purchasing agent, etc.)				
DD O IT CT MANY				
PROJECT NAME:				
OWNER:				
CITY/STATE:				
DOLLAR AMOUNT: \$	DATE COMPLETED:			
PUBLICALY BID? YES NO				
TYPE OF WORK?:				
CONTACT PERSON:				
CONTACT PERSON'S RELATION TO PROJECT?: _				
(i.e., contract manager, purchasing agent, etc.)				
DDOIECT NAME				
PROJECT NAME:				
OWNER:				
CITY/STATE: DOLLAR AMOUNT: \$				
PUBLICALY BID? YES NO	DATE COMPLETED			
TVDE OF WODK?				
CONTACT PERSON:	TELEDIONE #. ()			
CONTACT PERSON'S RELATION TO PROJECT?:(i.e., contract manager, purchasing agent, etc.)				
	herein is complete and accurate and hereby authorizes and information requested by the City of Newton in verification of the ons and experience.			
DATE: BIDDER:				
SIGNATURE:				
PRINTED NAME:	TITLE:			

END OF SECTION

9.

CONTRACT FORMS		
The awarded bidder will be required to complete and submit the following documents in order to execute a contract pursuant to the bid.	iis	
The forms are provided for informational purposes only.		
None of the following forms are required at the time of bid submittal.		

CITY-CONTRACTOR AGREEMENT

	CONTRACT NO.	. C-
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THIS AGREEMENT made this day of in the year Two Thousand and Nine by and between the CITY OF NEWTON, a municipal corporation organized and existing under the laws of the Commonwealth of Massachusetts, hereinafter referred to as the CITY, acting through its Chief Procurement Officer, but without personal liability to him, and
hereinafter referred to as the CONTRACTOR.

The parties hereto for the consideration hereinafter set forth agree as follows:

ARTICLE 1. STATEMENT OF WORK. The Contractor shall furnish all labor, materials, and equipment and perform all work required in strict accordance with the Contract Documents for the following project:

PUMP REPLACEMENT AT LONGFELLOW ROAD PUMP STATION Base Bid (Pump & Motor) Alternate #1 (Starter)

- **ARTICLE 2. TIME OF COMPLETION.** The Contractor shall commence work under this Contract on the date specified in the written notice of the City to proceed and shall fully complete all work hereunder within the time specified in the Summary of Work and Specific Work Requirements of the Project Manual. Time is of the essence with regard to this contract. Failure to complete within the time specified shall be subject to the assessment of liquidated damages in accordance with the provisions contained in the Project Manual.
- **ARTICLE 3. THE CONTRACT PRICE.** The City shall pay the Contractor for the full and satisfactory performance of the Contract a sum not to exceed:

\$

- **ARTICLE 4. CONTRACT DOCUMENTS.** The Contract Documents consist of the following documents which are either attached to this Agreement or are incorporated herein by reference:
 - a. This CITY-CONTRACTOR Agreement;
 - b. The City's Invitation For Bid #10-03 issued by the Purchasing Department;
 - c. The Project Manual for Pump replacement at Longfellow Pump Station including the Instructions to Bidders; General Conditions; Special Conditions; MWBE/AA Requirements, Wage Rate Requirements and Wage Rate Schedule(s) including any updated prevailing wage rate schedules if applicable; The Supplementary Special Conditions; General Requirements and Project Specifications; and Drawings, if included or referenced therein;
 - d. Addenda Number(s) ;
 - e. The Bid Response of the CONTRACTOR submitted for this Project and accompanying documents and certifications:
 - f. Certificate(s) of Insurance and surety bond(s) submitted by the CONTRACTOR in connection with this Project;
 - g. Duly authorized and executed Amendments, Change Orders or Work Orders issued by the CITY after execution of this CITY-CONTRACTOR Agreement.

This CITY-CONTRACTOR Agreement, together with the other documents enumerated in this Article, constitute the entire Agreement between the CITY and the CONTRACTOR.

ARTICLE 5.	ALTERNATES. The following Alternates have been accepted and their costs are included in the Contract Price
	stated in Article 3 of this Agreement:

ARTICLE 6. APPLICABLE STATUTES. All applicable federal, state and local laws and regulations are incorporated herein by reference and the Contractor agrees to comply with same.

IN WITNESS WHEREOF, the parties have caused this instrument to be executed under seal the day and year first above written.

CONTRACTOR	CITY OF NEWTON
By	By
Title	By
Date	Date
Affix Corporate Seal Here	By
	By
	Date
City funds in the amount of \$ are available in account number 27A401Y3-586010	Approved as to Legal Form and Character
I further certify that the Mayor is	By
authorized to execute contracts and approve change orders	Date
By Comptroller of Accounts	CONTRACT AND BONDS APPROVED
Date	By David B. Cohen, <i>Mayor</i>
	Date

CERTIFICATE OF AUTHORITY - CORPORATE

1.	I hereby certify that I am the Clerk/Secretary of
	(insert full name of Corporation)
2.	corporation, and that (insert the name of officer who signed the <u>contract and bonds</u> .)
	(insert the name of officer who signed the contract and bonds .)
3.	is the duly elected (insert the title of the officer in line 2)
4	
4.	of said corporation, and that on (insert a date that is <i>ON OR BEFORE</i> the date the officer signed the contract and bonds.)
	at a duly authorized meeting of the Board of Directors of said corporation, at which all the directors were present or waived notice, it was voted that
5.	(insert name from line 2) (insert title from line 3)
	(insert name from line 2) (insert title from line 3)
	of this corporation be and hereby is authorized to execute contracts and bonds in the name and on behalf of said corporation, and affix its Corporate Seal thereto, and such execution of any contract of obligation in this corporation's name and on its behalf, with or without the Corporate Seal, shall be valid and binding upon this corporation; and that the above vote has not been amended or rescinded and remains in full force and effect as of the date set forth below.
6.	ATTEST: AFFIX CORPORATE (Signature of Clerk or Secretary)* SEAL HERE
	(Signature of Clerk or Secretary)* SEAL HERE
7.	Name:(Please print or type name in line 6)*
8.	Date: (insert a date that is <i>ON OR AFTER</i> the date the
	(insert a date that is <i>ON OR AFTER</i> the date the officer signed the <u>contract and bonds</u> .)

 \ast The name and signature inserted in lines 6 & 7 must be that of the Clerk or Secretary of the corporation.

ATTESTATION

Pursuant to MG c. 62C, § 49A, the undersigned acting on behalf of the Contractor, certifies under the penalties of perjury that, to the best of the undersign's knowledge and belief, the Contractor is in compliance with all laws of the Commonwealth relating to taxes, reporting of employees and contractors, and withholding and remitting child support.*

Signature of Individual or Corporate Contractor (Mandatory)	* Contractor's Social Security Number (Voluntary) or Federal Identification Number	
By: Corporate Officer (Mandatory, if applicable)	Date:	

- * The provision in the Attestation relating to child support applies only when the Contractor is an individual.
- ** Approval of a contract or other agreement will not be granted unless the applicant signs this certification clause.
- *** Your social security number will be furnished to the Massachusetts Department of Revenue to determine whether you have met tax filing or tax payment obligations. Providers who fail to correct their non-filing or delinquency will not have a contract or other agreement issued, renewed, or extended. This request is made under the authority of GL c. 62C, § 49A.

CITY OF NEWTON, MASSACHUSETTS

PAYMENT BOND

Know All Men By These Presents:		
That we,	, as PRINCIPAL, and d unto the City of Newton as Obligee, in the sum of	, as
SURETY, are held and firmly bound		
which payments well and truly to be assigns, jointly and severally, firmly	dollars (\$) to made, we bind ourselves, our respective heirs, executors, administry by these presents.	
	PAL has made a contract with the Obligee, bearing the date of in Newton, Massachusetts. (Project Title)	, 2009, for the
	(Project Title)	
modifications, alterations, extension SURETY of such modifications, alterations, alterations, alterations of such modifications, alterations of such modifications, alterations, extension SURETY of such modifications, alterations, extension SURETY of such modifications, alterations, extension SURETY of such modifications, alterations, alterat	shed and for all materials used or employed in said contract and in an assoftime, changes or additions to said contract that may hereafter be erations, extensions of time, changes or additions being hereby waiven, and to be subject to, provisions of M.G.L. c. 30, sec. 39A, and M become null and void; otherwise it shall remain in full force, virtue a CNCIPAL and SURETY have hereto set their hands and seals this	e made, notice to the red, the foregoing to include a.G.L. c. 149 sec. 29, as and effect.
PRINCIPAL	<u>SURETY</u>	
BY(SEAL)		
(Title)		
ATTEST:	ATTEST:	

CITY OF NEWTON

GENERAL CONDITIONS OF THE CONTRACT FOR CONSTRUCTION

1.0 **DEFINITIONS**

1.1 THE CONTRACT DOCUMENTS

The term "Contract Documents" sometimes also referred to as the "Contract", means the contract entered into between the City of Newton (hereinafter "City") and the Contractor. It includes the Invitation for Bid, General Bid Form, Contract Form, these General Conditions of the Contract, Supplements and Amendments to the General Conditions (if any), Contract Specifications, Drawings, all addenda issued prior to execution of the contract, the Bid Bond, the Labor and Material Payment Bond, or other assurances of completion, the applicable wage rate determinations, and other documents listed in the Agreement and modifications issued after execution of the contract.

1.2 THE WORK

The term "Work", sometimes also referred to as the "Project", means the construction and services required by the Contract Documents, whether completed or partially completed, and includes all other labor, materials, equipment, and services provided or to be provided by the Contractor to fulfill the Contractor's obligation.

1.3 OWNER

The term "Owner" is the City of Newton.

1.4 CONTRACT OFFICER

The term "Contract Officer" means the person appointed by the Owner to administer the terms of the Contract between the Owner and the Contractor, who is also empowered to take certain actions under this Agreement.

1.5 CONTRACTOR

- 1.5.1 The Contractor, sometimes referred to as the General Contractor, is the person or entity identified as such throughout the Contract Documents as if singular in number. The term Contractor means the Contractor or its authorized representative.
- 1.5.2 The Contractor shall supervise and direct the Work, using the Contractor's best skill and attention. The Contractor shall be solely responsible for and have control over construction means, methods, techniques, sequences and procedures, and for coordinating all portions of the Work under the Contract.

1.6 SUBSTANTIAL COMPLETION

The term "Substantial Completion" means the value of the work remaining to be performed by the Contractor is, in the estimate of the awarding authority, less than one percent (1%) of the original contract price.

2.0 <u>CONTRACT ADMINISTRATION</u>

2.1 PRE-CONSTRUCTION CONFERENCE

2.1.1 Prior to commencement of the Work, the Contractor shall meet in conference with representatives of the Owner regarding the Owner's requirements under the Contract for administration of the quality assurance program, safety program, labor provisions, the schedule of work, and other Contract procedures.

2.1.2 The Contractor shall begin work upon receipt of a written Notice to Proceed from the Contract Officer or designee. The Contractor shall not begin work prior to receiving such notice.

2.2 CONTRACT PERIOD

The Contractor shall complete all work required under this contract within the timeframe specified eslewhere in this document, or within the time schedule established in the notice to proceed issued by the Contracting Officer.

2.3 REJECTION OF DEFECTIVE MATERIALS AND WORK

The Owner's inspection of the Work shall not relieve the Contractor of any of its responsibilities to fulfill the Contract obligations, and defective work shall be corrected without cost to the Owner. Unsuitable work may be rejected by the Owner, notwithstanding that such work and materials have been previously overlooked or misjudged by the Owner and accepted for payment. If the Work or any part thereof shall be found defective at any time before the final acceptance of the whole Work, the Contractor shall forthwith correct such defect in a manner satisfactory to the Owner, and if any material brought upon the site for use in the Work, or selected for the same, shall be rejected by the Owner as unsuitable or not in conformity with the Contract requirements, the Contractor shall forthwith remove such materials from the vicinity of the Work.

2.4 CHANGES

2.4.1 All changes in the work including any increase, decrease, or other equitable adjustment in the Contract price or in the time for performing the Contract, shall be authorized in writing by the Owner and/or Contract Officer prior to commencement.

2.5 PAYMENTS

2.5.1 CONTRACT PRICE

The Contract Price is stated in the Contract Form, and including authorized adjustments, is the total amount payable by the Owner to the Contractor for performance of the Work under the Contract Documents.

2.6 APPLICATIONS FOR PAYMENT

- 2.6.1 Once each month, on a date established by the Owner at the beginning of the Work, the Contractor shall deliver to the Owner an itemized Application for Payment, supported by such data substantiating the Contractor's right to payment as the Owner may require, and reflecting a minimum of 5% retainage until the final acceptance and payment by the Owner.
- 2.6.2 The Owner shall make payment to the Contractor within 30 days of receipt of said application, less any applicable retainage.
- 2.6.3 The Owner may make changes in any application for payment submitted by the Contractor for:
- i. Retention based on the value of its claims against the Contractor,
- ii. Retention of 5% of the approved amount of the Application for Payment.

2.7 FINAL PAYMENT

The acceptance by the Contractor of the last payment due under this Contract or the execution of the Final Certificate of Completion, shall operate as a release to the Owner from all claims and liability related to this Contract.

2.8 GUARANTY AND WARRANTY

2.8.1 WARRANTY

The Contractor warrants to the Owner that materials and equipment furnished under the Contract will be of good quality and new unless otherwise required or permitted by the Contract Documents, that the Work will be free from defects not inherent in the quality required or permitted, and that the Work will conform with the requirements of the Contract Documents. Work not conforming to these requirements, including substitutions not properly approved and authorized, may be considered defective. If required by the Owner, the Contractor shall furnish satisfactory evidence as to the kind and quality of materials and equipment.

2.8.2 GENERAL GUARANTY

If at any time during the period of one (1) year from the date of Substantial Completion of the Work to be performed under this Contract, any part of the Work shall, in the reasonable determination of the Owner, require replacing or repairing due to the fact that it is broken, defective, or otherwise does not conform to the Contract Documents, the Owner will notify the Contractor to make the required repairs or replacement. If the Contractor shall neglect to commence such repairs or replacement to the satisfaction of the Owner within ten (10) days from the date of giving or mailing such notice, then the Owner may employ other persons to make the same. The Contractor agrees, upon demand, to pay to the Owner all amounts which the Owner expends for such repairs or replacements. During this one year guarantee period any corrective work shall be performed in accordance with the applicable terms of this Contract. For items of work completed after use and occupancy has been taken, the one year guarantee shall commence at the time the Owner accepts such items. This one year guarantee shall not limit any express guaranty or warranty provided elsewhere in the Contract.

2.9 INSURANCE REQUIREMENTS

2.9.1 The Contractor shall provide insurance coverage as listed below. This insurance shall be provided at the Contractor's expense and shall be in full force and effect during the full term of this Contract.

WORKER'S COMPENSATION

Worker's Compensation: Per M.G.L. c.. 149, s. 34 and c.. 152 as amended.

COMMERCIAL GENERAL LIABILITY

Personal Injury \$500,000 each occurrence

\$1,000,000 aggregate

Property Damage \$500,000 each occurrence

\$1,000,000 aggregate

VEHICLE LIABILITY

Personal Injury \$500,000 each person

\$1,000,000 aggregate

Property Damage \$300,000

2.9.2 OWNER AS CO-INSURED

The Owner shall be named as additional insureds on the Contractor's Liability Policies.

2.9.3 CERTIFICATES OF INSURANCE. POLICIES

- i. The Contractor shall not commence the work until proof of compliance with this Section 2.9 has been furnished to the Owner by submitting one copy of a properly endorsed insurance certificate issued by a company authorized to write insurance in the Commonwealth. This certificate shall indicate that the contractual liability coverage is in force.
- ii. The Contractor shall file the original and one certified copy of all policies with the Owner within fifteen (15) days after contract award. If the Owner is damaged by the Contractor's failure to maintain such insurance and to so notify the Owner, then the Contractor shall be responsible for all reasonable costs attributable thereto.

2.9.4 CANCELLATION

Cancellation of any insurance required by this contract, whether by the insurer or the insured, shall not be valid unless written notice thereof is given by the party proposing cancellation to the other party and Owner at least thirty days prior to the effective date thereof, which shall be expressed in said notice.

2.10 INDEMNIFICATION

The Contractor shall take all responsibility for the Work and take all precautions for preventing injuries to persons and property in or about the Work; shall bear all losses resulting to or on account of the amount or character of the Work. The Contractor shall pay or cause payment to be made for all labor performed or furnished and for all materials used or employed in carrying out this Contract. The Contractor shall assume the defense of, and indemnify and save harmless the Owner, and the Owner's officers and agents from all claims relating to labor performed or furnished and materials used or employed for the Work; to inventions, patents and patent rights used in and in doing the Work unless such patent infringement is due to a product or process specified by the Owner; to injuries to any person or corporation received or sustained by or from the Contractor and any employees, and subcontractors and employees, in doing the work, or in consequence of any improper materials, implements or labor used or employed therein; and to any act, omission or neglect of the Contractor and any employees therein.

2.11 BONDS

The Contractor shall provide the Owner with a performance and with a payment or labor and materials bond in the form provided by the Owner, executed by a surety company licensed by the Commonwealth of Massachusetts' Division of Insurance. Such bond shall be in an amount equal to at least one half of the Contract price unless otherwise stated in the Contract Documents. All bonds shall be accompanied by a current power of attorney.

2.12 TERMINATION

2.12.1 TERMINATION FOR CAUSE

- i. The Owner may terminate this contract for cause if it determines that any of the following circumstances have occurred:
 - a. The Contractor is adjudged bankrupt or has made a general assignment for the benefit of its creditors.
 - b. A receiver has been appointed of the Contractor's property.
 - c. All or a part of the Work has been abandoned.
 - d. The Contractor has sublet or assigned all or any portion of the Work, the Contract, or claims thereunder, without the prior written consent of the Owner, except as provided in the Contract.
 - e. The Owner has determined that the rate of progress required on the project is not being met.
 - f. The Contractor has substantially violated any provisions of this Contract.
- ii. The Owner may complete the Work, or any part thereof, and charge its expense of so completing the Work or part thereof, to the Contractor.
- iii. The Owner may take possession of and use any materials, machinery, implements and tools found upon the site of said Work. The Owner shall not be liable for any depreciation, loss or damage to said materials, machinery, implements or tools during said use and the Contractor shall be solely responsible for their removal from the Project site after the Owner has no further use for them.

2.12.2 TERMINATION - NO FAULT

i. In the event that this Contract is terminated by the Owner, prior to the completion of construction and termination is not based on a reason listed in Paragraph 2.12.1, the Contractor shall be compensated for its costs incurred on the Project, including reasonable costs of de-mobilization, covering the period of time between the last approved application for payment and the date of termination.

ii. Payment by the Owner pursuant to Section 2.7 shall be considered to fully compensate the Contractor for all claims and expenses and those of any consultants, subcontractors, and suppliers, directly or indirectly attributable to the termination, including any claims for lost profits.

2.13 PERMITS, FEES, AND NOTICES

- 2.13.1 The Contractor shall secure and the Owner shall pay for the building permit, if required. The Contractor shall coordinate all efforts required to obtain this permit. All other permits and governmental fees, licenses, and inspections necessary for proper execution and completion of the Work shall be secured and paid for by the Contractor.
- 2.13.2 The Contractor shall comply with and give notices required by laws, ordinances rules, regulations, and lawful orders of public authorities bearing on performance of the Work.
- 2.13.3 If the Contractor performs Work that it knows or reasonably should know is contrary to laws, statutes, ordinances, building codes, and rules and regulations without such notice to the Owner, the Contractor shall assume full responsibility for such Work and shall bear the attributable costs.

2.14 SAFETY REQUIREMENTS

2.14.1 The Contractor shall comply with all Federal, State, and local safety laws and regulations applicable to the Work performed under this Contract.

2.15 TEMPORARY HEATING

The Contractor shall provide and pay for temporary heating, covering, and enclosures necessary to properly protect all work materials against damage by dampness and cold, to dry out the Work, and to facilitate the completion of the Work. Any permanent heating equipment used shall be turned over to the City in the condition and at the time required by the specifications.

AVAILABILITY AND USE OF UTILITY SERVICES

2.16.1 The City shall make all reasonably required amounts of utilities available to the Contractor from existing outlets and supplies, as specified in the Contract. Unless otherwise provided in the Contract, the amount of each utility service consumed shall be charged to or paid for by the Contractor at prevailing rates charged to the City or, where the utility is produced by the City, at reasonable rates determined by the Contracting Officer. The Contractor shall carefully conserve any utilities furnished without charge.

The Contractor, at its expense and in a manner satisfactory to the Contracting Officer, shall install and maintain all necessary temporary connections and distribution lines, and all meters required to measure the amount of each utility used for the purpose of determining charges. Before final acceptance of the Work by the City, the Contractor shall remove all the temporary connections, distribution lines, meters, and associated paraphernalia.

2.17 DISPUTES

2.16

2.16.2

- 2.17.1 "Claim," as used in this section, means a written demand or written assertion by one of the contracting parties seeking, as a matter of right, the payment of money in a sum certain, the adjustment or interpretation of contract terms, or other relief arising under or relating to the contract. A claim arising under the Contract, unlike a claim relating to the Contract, is a claim that can be resolved under a Contract clause that provides for the relief sought by the claimant. A voucher, invoice, or other routine request for payment that is not in dispute when submitted is not a claim. The submission may be converted to a claim by complying with the requirements of this section, if it is disputed either as to liability or amount or is not acted upon in a reasonable time.
- 2.17.2 All disputes arising under or relating to this Contract, including any claims for damages for the alleged breach thereof which are not disposed of by agreement, shall be resolved under this section.
- 2.17.3 All claims by the Contractor shall be made in writing and submitted to the Contract Officer for a written decision. A claim by the City against the Contractor shall be subject to a written decision by the Contract Officer.

- 2.17.4 The Contract Officer shall, within thirty (30) days after receipt of the request, decide the claim or notify the Contractor of the date by which the decision will be made.
- 2.17.5 The Contract Officer's decision shall be final unless the Contractor (1) appeals in writing to a higher level in the City, (2) refers the appeal to an independent mediator or arbitrator, or (3) files suit in a court of competent jurisdiction. Such appeal must be made within thirty (30) days after receipt of the Contract Officer's decision.
- 2.17.6 The Contractor shall proceed diligently with performance of this Contract and/or any authorized change thereof, pending final resolution of any request for relief, claim, appeal, or action arising under or relating to the Contract and/or any authorized change thereof, and comply with any decision of the Contract Officer.

2.18 LIQUIDATED DAMAGES

- 2.18.1 If the Contractor fails to complete the Work within the time specified in the contract, or any extension thereof, the Contractor shall pay to the City as liquidated damages, the sum of \$50.00 for each day of delay. If different completion dates are specified in the Contract for separate parts or stages of the work, the amount of liquidated damages shall be assessed on those parts or stages which are delayed. To the extent that the Contractor's delay or nonperformance is excused under another section in this Contract, liquidated damages shall not be due the City. The Contractor remains liable for damages caused other than by delay.
- 2.18.2 If the City terminates the Contractor's right to proceed pursuant to section 2.12.1, the resulting damage will consist of liquidated damages until such reasonable time as may be required for final completion of the Work together with any increased costs to the City in completing the Work.
- 2.18.3 If the City does not terminate the Contractor's right to proceed, the resulting damage will consist of liquidated damages until the Work is completed or accepted.

3.0 SALES TAX EXEMPTION AND OTHER TAXES

- 3.0.1 To the extent that materials and supplies are used or incorporated in the performance of this Contract, the Contractor is considered an exempt purchaser under the Massachusetts Sales Act, Chapter 14 of the Acts of 1966.
- 3.0.2 The Contractor shall be responsible for paying all other taxes and tariffs of any sort, related to the Work.

3.1 PROHIBITION AGAINST LIENS

The Contractor is prohibited from placing a lien on the City's property. This prohibition shall apply to all subcontractors at any tier and all materials suppliers.

3.2 ORDER OF PRECEDENCE

In the event of a conflict between these General Conditions and the Specifications, the General Conditions shall prevail. In the event of a conflict between the Contract and any applicable state or local law or regulation, the state or local law or regulation shall prevail; provided that such state or local law or regulation does not conflict with, or is less restrictive than applicable federal law, regulation, or Executive Order. In the event of such a conflict, applicable federal law, regulation, and Executive Order shall prevail.

3.3 EXAMINATION AND RETENTION OF CONTRACTOR'S RECORDS

The City of Newton shall, until three (3) years after final payment under this Contract, have access to and the right to examine any of the Contractor's directly pertinent books, documents, papers, or other records involving transactions related to this Contract for the purpose of making audit, examination, excerpts, and/or transcriptions.

END OF SECTION

CITY OF NEWTON

WAGE RATE REQUIREMENTS

1. GENERAL

- **A.** This section summarizes the requirements for the payment of wages to laborers and mechanics employed under the Contract.
- **B.** Other duties and requirements of law which may not be specified in this section apply and are inherently part of the Contract.

2. WAGE RATES

- A. The rate per hour to be paid to mechanics, apprentices, teamsters, chauffeurs, and laborers employed on the Work shall not be less than the rate of wages in the attached "Minimum Wage Rates" as determined by the Commissioner of Labor and Industries. The schedule of prevailing wage rates will be updated annually for all public construction projects lasting longer than one (1) year. The contractor shall pay the prevailing wage rate set out in the applicable prevailing wage rate schedule. Increases in prevailing wage rates shall not be the basis for a change order.
- **B.** Keep posted on the site a legible copy of said schedule. Keep on file the wage rates and classifications of labor employed on this Work in order that they may be available for inspection by the Owner, Administrator, or the Architect.
- **C.** Apprentices employed pursuant to this determination of wage rates must be registered and approved by the State Apprenticeship Council wherever rates for journeymen or apprentices are not listed.
- **D.** Pay reserve police officers employed on the Work the prevailing rate of wages paid to regular police officers as required by M.G.L. c 149, Sec. 34B, as amended. Such police officers shall be covered by Workmen's Compensation Insurance and Employers Liability Insurance by the Contractor.
- E. The Contractor and all subcontractors shall, on a weekly basis throughout the term of the contract, provide to the City of Newton certified payroll affidavits verifying compliance with M.G.L. c.149, Sec. 27, 27A and 27B.
- **F.** The Contractor and all subcontractors shall provide a Statement of Compliance within 15 days of the completion of its portion of the work. This statement shall be submitted to the Owner on the form found elsewhere in this section.
- G. The Contractor shall maintain accurate and complete records, including payroll records, during the Contract term and for three years thereafter. Filings made by the Contractor pursuant to Clauses 47, 48 and 49 of the General Conditions shall be deemed to constitute compliance with State filing requirements under the Massachusetts Prevailing Wage Law.



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classification			Effective Dates and Total Rates							
Construction										
(2 AXLE) DRIVER - EQUIPMENT			12/01/2008	\$42,260						
(3 AXLE) DRIVER - EQUIPMENT			12/01/2008	\$42,330						
(4 & 5 AXLE) DRIVER - EQUIPMENT			12/01/2008	\$42,450						
ADS/SUBMERSIBLE PIL OT			08/01/2008	\$97.960	08.01/2009	\$102.480	08/01/2010	\$107.460		
			08/01/2011	\$112.980						
AIR TRACK OPERATOR			06.01/2009	\$46.850	12.01/2009	\$47.850	06/01/2010	\$48.850		
			12/01/2010	\$50.100	06.01/2011	\$51.100	12/01/2011	\$52350		
ASBEST OS REMOVER - PIPE / MECH. EQUIPT.			06/01/2009	\$39.250	12.01/2009	\$40.250				
ASPHALT RAKER			06/01/2009	\$46350	12.01/2009	\$47.350	06/01/2010	\$48350		
			12/01/2010	\$49,600	06.01/2011	\$50,600	12/01/2011	\$51.850		
ASPHALT/CONCRETE/CRUSHER PLANT-ON SITE			06/01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59.780		
			12/01/2010	\$61,030						
BACKHOEAFRONT-END LOADER			06/01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59.780		
			12/01/2010	\$61,030						
BARCO TYPE JUMPING TAMPER			06/01/2009	\$46350	12.01/2009	\$47.350	06/01/2010	\$48350		
			12/01/2010	\$49,600	06.01/2011	\$50,600	12/01/2011	\$51.850		
BLOCK PAVER, RAMMER / CURB SETTER			06/01/2009	\$46.850	12.01/2009	\$47.850	06/01/2010	\$48.850		
			12/01/2010	\$50.100	06.01/2011	\$51.100	12/01/2011	\$52350		
BOILER MAKER			10.01/2008	\$54,800						
APPRENTILE: BOILERMAKER - Local 29										
Ratio Sup 1 2	3	+	5	3.6	7	8				
15 % 65.00 65.00	70.00	75.00	80.00	85.00	90.00	95.00				
BRICKSTONE/ARTIFICIAL MASONRY (INCL. MAS	ONRY		02/01/2009	\$65,320	08.01/2009	\$67.120	02/01/2010	\$68.010		
WATERPROOFING)			08/01/2010	\$69.910	02.01/2011	\$70,900	08/01/2011	\$73,000		
			02/01/2012	\$73,990						
appreniue: bruck/plasiercemeni maso	N - Local 3 Nuwton									
Ratio Sup 1 2	3	+	3							
1.5 % 50.00 40.00	70.00	80.00	90.00							
BULLDOZER/GRADER/SCRAPER			06/01/2009	\$57,090	12.01/2009	\$58.190	06/01/2010	\$59,430		
			12/01/2010	\$60,680						
CAISSON & UNDERPINNING BOTTOM MAN			06/01/2009	\$47.200	12.01/2009	\$48.200	06/01/2010	\$49.200		
			12/01/2010	\$50.450	06.01/2011	\$51.450	12/01/2011	\$52.700		
CAISSON & UNDER PINNING LABORER			06/01/2009	\$46,100	12.01/2009	\$47.100	06/01/2010	\$48.100		
			12/01/2010	\$49.350	06.01/2011	\$50,350	12/01/2011	\$51.600		
CAISSON & UNDER PINNING TOP MAN			06/01/2009	\$46.100	12.01/2009	\$47,100	06/01/2010	\$48.100		
			12.01/2010	\$49.350	06/01/2011	\$50.350	12.01/2011	\$51.600		
CARBIDE CORE DRILL OPERATOR			06.01/2009	\$46350	12/01/2009	\$47.350	06/01/2010	\$48.350		
			12.01/2010	\$49.600	06/01/2011	\$50,600	12/01/2011	\$51.850		
CARPENTER			03.01/2009	\$52,770						

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27 $\,$

Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 1 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION Job Location: LONGFELLOW ROAD PUMP STATION

Cla	assifica	tion										
	APPREI	NICE: C	ARPENTER- Z	om 2 Eastern MA	ā							
	Ratio	Sup	1	2	3		3	3	7	8		
	15	%	50.00	40,00	70.00	75.00	80.00	80.00	90.00	90.00		
CEME	ENT MA	S ONRY/	PLASTERING				02/01/2009	\$64.110	08.01/2009	\$65.510	02/01/2010	\$66,200
							08/01/2010	\$67,670	02.01/2011	\$68.440	08/01/2011	\$70,060
							02/01/2012	\$70.830				
CHAD	INSAW	OPERAT	OR				06/01/2009	\$46.350	12.01/2009	\$47.350	06/01/2010	\$48350
							12/01/2010	\$49,600	06.01/2011	\$50,600	12.01/2011	\$51.850
CLAM	M SHELI	LS/SLURI	RY BUCKETS.	HEADING MA	CHINES		06/01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59.780
							12/01/2010	\$61,030				
COMP	PRESSO	R OPERA	ATOR				06/01/2009	\$47,070	12.01/2009	\$47.890	06/01/2010	\$48.810
							12/01/2010	\$49.740				
DELE	CADER (BRIDGE)	Ê				07/01/2009	\$62.260	01.01/2010	\$63.410		
DEMO	O: ADZI	EMAN					06/01/2009	\$46.100	12.01/2009	\$47,100	06/01/2010	\$48.100
							12/01/2010	\$49.350	06.01/2011	\$50.350	12,01,2011	\$51,600
DEMO	O: BACE	KHOE/LO	ADER/HAMN	ER OPERATOI	R		06/01/2009	\$47.100	12.01/2009	\$48.100	06/01/2010	\$49.100
							12/01/2010	\$50.350	06.01/2011	\$51350	12/01/2011	\$52,600
DEMO	O: BURI	NERS					06/01/2009	\$46.850	12.01/2009	\$47.850	06/01/2010	\$48.850
							12/01/2010	\$50.100	06.01/2011	\$51.100	12.01/2011	\$52350
DEMO	o: con	CRETE C	UTTER/SAWY	TER			06/01/2009	\$47.100	12.01/2009	\$48.100	06.01/2010	\$49.100
							12/01/2010	\$50.350	06.01/2011	\$51350	12.01/2011	\$52,600
DEMO	O: JACK	HAMME	R OPERATOR	i i			06/01/2009	\$46.850	12.01/2009	\$47.850	06.01/2010	\$48.850
							12/01/2010	\$50.100	06.01/2011	\$51.100	12.01/2011	\$52350
DEMO	0: WRE	CKING L	AB OR ER				06/01/2009	\$46.100	12.01/2009	\$47.100	06.01/2010	\$48.100
							12/01/2010	\$49.350	06.01/2011	\$50,350	12.01/2011	\$51.600
DIREC	CTION	LDRILL	MACHINE O	PERATOR			06/01/2009	\$57,090	12.01/2009	\$58.190	06/01/2010	\$59.430
							12/01/2010	\$60,680				
DIVE	IR.						08/01/2008	\$72.590	08.01/2009	\$75,600	08/01/2010	\$78.890
							08/01/2011	\$82.740				
DIVE	RTEND	ER					08/01/2008	\$58,090	08.01/2009	\$60.240	08.01/2010	\$62.590
							08/01/2011	\$65340				
DIVE	RTEND	ER (EFFI	LUENT)				08/01/2008	\$76.210	08.01/2009	\$79,440	08/01/2010	\$82.960
							08.01/2011	\$87,090				
DIVE	RSLUR	RY (EFFI	LUENT)				08.01/2008	\$97.960	08/01/2009	\$102.480	08.01/2010	\$107.410
		15	- 3				08.01/2011	\$113.190				
ELEC.	TRICLA	И					03.01/2009	\$63.550	09/01/2009	\$64.780	03/01/2010	\$66,020
							09/01/2010	\$67.260	03.01/2011	\$68,490		

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27 Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

Issue Date: 07/23/2009 20090722-055 Wage Request Number: Page 2 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	tion					Effective Da	tes and Tota	d Rates			
APPRE	NIL'E:	elec trician -	Local 103								
Ratio	Sup	1	2	3	+	3		7	8	9	10
23 ***	%	40.00	40.00	45.00	+5.00	50.00	55.00	40.00	65,00	70.00	75.00
						App Pri	or1/1/03;30/35#()#550055K570775	60		
LEVATOR	CONST	RUCTOR				01.01/2009	\$63.690	01.01.2010	\$65.190	01.01/2011	\$66.690
						01/01/2012	\$68.190				
APPRE	NIL'E:	ELEVATOR CO	nsirucior - la	cal+							
Ratio	Sup	1	2	3	+	5					
11	%	50 .00	55.00	65.00	70.00	80.00					
						Stops 1-	2 am 6 mos; Staps	3-5 am 1 year			
CLEVATOR	CONST	RUCTOR HELP	ER			01/01/2009	\$49.830	01.01/2010	\$51330	01.01.2011	\$52.830
						01/01/2012	\$54.330				
ENCE & GU	IARD R	AIL ERECTOR				06/01/2009	\$46350	12.01/2009	\$47.350	06,01/2010	\$48350
						12/01/2010	\$49,600	06.01/2011	\$50,600	12.01/2011	\$51.850
TELD ENG.	- INST	PERS ON (BLD)	e, site, hvy c	ONST)		05/01/2009	\$54.780	11.01/2009	\$55.890	05/01/2010	\$56,990
						11.01/2010	\$58,230	05/01/2011	\$59.470		
TELD ENG.	ROD F	erson (bldg	SITE, HVY CO	NST)		05/01/2009	\$40.260	11/01/2009	\$40.910	05/01/2010	\$41.560
						11.01/2010	\$42,290	05/01/2011	\$43,020		
TELD ENG.	CHIEF	OF PARTY (BL)	d <mark>g,site, hvy</mark>	CONST)		05/01/2009	\$56.140	11.01/2009	\$57.250	05/01/2010	\$58.360
						11.01/2010	\$59.610	05/01/2011	\$60.860		
TRE ALARN	INST A	LLER				03/01/2009	\$63.550	09/01/2009	\$64.780	03.01/2010	\$66,020
						09/01/2010	\$67.260	03/01/2011	\$68,490		
TRE ALARN	(REPAI	R/MAINTENA	NCE			03/01/2009	\$51,620	09/01/2009	\$52.540	03.01/2010	\$53.470
						09/01/2010	\$54.410	03.01/2011	\$55330		
TREMAN(A	SST. E	(GINEER)				06/01/2009	\$51.780	12.01/2009	\$52.740	06.01/2010	\$53.810
						12/01/2010	\$54,890				
LAGGER &	SIGNA	LER				06/01/2009	\$35,100	12.01/2009	\$35,100	06.01/2010	\$36,100
						12.01/2010	\$36,100	06/01/2011	\$37,100	12.01/2011	\$37.100
LOORCOVI				1810		03.01/2009	\$58.380				
APPREI Ratio	NICE: Sup	1	IR - Logal 2148 Zo 2	16 .I 3	4	5		7	8		
11	%	50.00	55.00	60.00	65,00	70.00	75.00	80.00	85.00		
1071	cont	ranna.	25.00	Whithout	7550A.O.		s 750 has.	(6:8.5)			
ORK LIFT/O	HERRY	PICKER				06.01/2009	\$57.410	12/01/2009	\$58.530	06.01/2010	\$59.780
						12,01/2010	\$61.030	-200212003		- 510 2120 20	700,100
ENERATOR	R/LIGHT	ING PLANT/H	EATERS			06/01/2009	\$47.070	12.01/2009	\$47.890	06.01/2010	\$48.810
-						12/01/2010	\$49.740		- 11 T- 12	- 417 5177 570	

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27

Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 3 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	ation	Effective Dates and Total Rates									
GLAZIER (G	LASS PL	ANK/AIR BAI	RIER/INTERIO	RSYSTEMS)		07/01/2009	\$51.760	01.01/2010	\$52.910		
APPRE	NICE:	GLAZIER- Log	135 Zone 2								
Ratio	Stop	1	2	3	+	-3		7	8		
11	%	50.00	55.00	60.00	65,00	70.00	75.00	80.00	90.00		
						Steps and	750 hrs.				
Hoisting e	nginee	R/CRANES/GE	ADALLS			06.01/2009 12.01/2010	\$57.410 \$61.030	12/01/2009	\$58.530	06.01.2010	\$59.780
APPRE	NICE:	HOIST/FOR.T.E	NG - Local 4								
R.atrio	Sup	1	2	3		3	£	7	8		
1:6	%	55.00	00,00	65.00	70.00	75.00	80.00	85.00	90.00		
HVAC (DUC	TWORK)				02/01/2009	\$61,020	08.01/2009	\$62.270	02/01/2010	\$63.520
HVAC (ELEC	TRICAL	CONTROLS)				03.01/2009	\$63,550	09.01/2009	\$64.780	03/01/2010	\$66,020
						09.01/2010	\$67.260	03.01/2011	\$68.490		
HVAC (TEST	ING AN	D BALANCIN	G-AIR)			02.01/2009	\$61,020	08.01/2009	\$62.270	02/01/2010	\$63.520
HVAC (TEST	ING AN	D BALANCIN	G-WATER)			03/01/2009	\$65,980	09.01/2009	\$67.480	03/01/2010	\$68.730
HVAC MECH	HANIC					03/01/2009	\$65,980	09.01/2009	\$67.480	03/01/2010	\$68,730
HYDRAULIO	DRILL	3				06/01/2009	\$46.850	12.01/2009	\$47.850	06/01/2010	\$48.850
						12.01/2010	\$50.100	06,01/2011	\$51.100	12/01/2011	\$52350
INSULATOR	(PIPES a	% TANKS)				09.01/2008	\$56,860	09.01/2009	\$59.260	09/01/2010	\$61.660
APPRE	NICE:	ASBESTOS INS	ULATOR (Pipes &	Ianks) - Local 6 Bo	oto n						
Ratio	Sup	1	2	3	4						
1.5	%	50.00	60.00	70.00	80.00						
						Steps an	l year				
IRONWORK	ERAWEL	DER				03/16/2009	\$58.230	09/16/2009	\$59.580	03/16/2010	\$60.980
APPRE	NIEE:	IRONWORKER.	- Local7								
R.atio	Sup	1	2	3	+	3					
	%	60.00	70.00	75.00	80.00	85.00	90.00				
Structur	al 1:4; Om	amentall:									
JACKHAMM	ER & PA	VING BREAK	ER OPERATOR			06/01/2009	\$46350	12.01/2009	\$47.350	06,01/2010	\$48350
						12.01/2010	\$49,600	06.01/2011	\$50,600	12/01/2011	\$51.850
LABORER						06.01/2009	\$46.100	12.01/2009	\$47.100	06/01/2010	\$48.100
						12.01/2010	\$49.350	06.01/2011	\$50.350	12.01/2011	\$51,600
APPRE	NICE:	LABORER - Zor	a 1								
Ratio	Sup	1	2	3	+						
15	%	60.00	70.00	80.00	90.00						

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Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 4 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classific	ation					Effective Dates and Total Rates								
LABORER: 0	CARPEN	TER TENDER				06/01/2009	\$46.100	12.01/2009	\$47.100	06/01/2010	\$48,100			
						12/01/2010	\$49.350	06.01/2011	\$50.350	12.01/2011	\$51,600			
LABORER: 0	CEMENT	FINISHER TE	NDER			06/01/2009	\$46,100	12/01/2009	\$47.100	06/01/2010	\$48,100			
						12/01/2010	\$49.350	06/01/2011	\$50.350	12.01/2011	\$51,600			
LABORER: H	HAZARI	OUS WASTE	ASBESTOS REI	MOVER		06/01/2009	\$46.100	12/01/2009	\$47.100	06.01/2010	\$48,100			
						12/01/2010	\$49.350	06/01/2011	\$50.350	12.01/2011	\$51,600			
LABORER: I	MASON	TENDER				06/01/2009	\$46350	12/01/2009	\$47.350	06/01/2010	\$48350			
						12/01/2010	\$49,600	06/01/2011	\$50,600	12.01/2011	\$51.850			
LABORER: I	MULTI-T	RADE TENDE	R			06/01/2009	\$46,100	12/01/2009	\$47.100	06/01/2010	\$48,100			
						12/01/2010	\$49.350	06/01/2011	\$50.350	12.01/2011	\$51,600			
LABORER: T	TREE RE	MOVER				06/01/2009	\$46,100	12/01/2009	\$47.100	06/01/2010	\$48,100			
						12/01/2010	\$49.350	06/01/2011	\$50.350	12.01/2011	\$51,600			
This classifice	ation app	lies to the wholes	sale removal											
		ling all associate	dtrimming of br	anches and limb	s, and applie:									
LASER BEA	M OPER	ATOR				06.01/2009	\$46.350	12/01/2009	\$47.350	06.01/2010	\$4835			
						12/01/2010	\$49.600	06/01/2011	\$50,600	12.01/2011	\$51.85			
MARBLE &	TLEF	IIS HERS				02/01/2009	\$54.800	08/01/2009	\$56.240	02,01/2010	\$56.95			
						08/01/2010	\$58.470	02/01/2011	\$59.270	08.01/2011	\$60.93			
						02/01/2012	\$61.740							
APPRE	NILE:	MARBLE-TILE-	TERRAZZO FINI	SHER - Local 3 M.	arble & Tile									
B.atrio	Sup	1	2	3	+	5								
13	%	50 .00	60.00	70.00	80.00	90.00								
						Steps an	800 hrs.							
MARBLE M.	ASONS,	filelayers &	TERRAZZO N	ŒCH		02/01/2009	\$65360	08.01/2009	\$67.160	02.01/2010	\$68.050			
						08/01/2010	\$69.950	02/01/2011	\$70.940	08.01/2011	\$73,04			
						02/01/2012	\$74,030							
APPRE	NICE:	MARBLE-TILE-	TERRAZZO MEC	HANIC - Local3 I	Marble & Tile		100000000000000000000000000000000000000							
Ratio	Sup	1	2	3	(4.	3								
13	%	50 .00	60.00	70.00	80.00	90.00								
MECH. SWE	EPER O	PERATOR (NOI	N-CONSTRUCT	NON)		07/01/2009	\$28300	07.01/2010	\$29,000	07.01/2011	\$29.70			
MECH. SWE	EPER O	PERATOR(ON	CONST. SITES)		06/01/2009	\$57,090	12.01/2009	\$58.190	06/01/2010	\$59,430			
						12/01/2010	\$60,680							
		FENANCE				06/01/2009	\$57,090	12.01/2009	\$58.190	06/01/2010	\$59.43			
MECHANICS	S MAIN						\$60,680							
MECHANICS	S MAIN					12/01/2010	\$00,000							
						12/01/2010 03/01/2009	0.134.534							
MILLWRIGE	HT (Zone		Local 1121 Zone 1	i.			\$54.400							
MECHANICS MILLWRIGH APPRE Ratio	HT (Zone	1)	Local 1171 Zone 1	3	+		0.134.534	7	8					

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 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 5 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	tion					Effective Dates and Total Rates								
MORTAR MI	XER					06/01/2009	\$46350	12/01/2009	\$47.350	06/01/2010	\$48.350			
						12.01/2010	\$49.600	06.01/2011	\$50,600	12.01/2011	\$51.850			
OILER (OTH	ER THAN	TRUCK CRA	nes,gradali	.S)		06/01/2009	\$41,090	12.01/2009	\$41.750	06/01/2010	\$42,480			
						12.01/2010	\$43,220							
OILER (TRU)	CK CRAN	ES, GRADAL	LS)			06/01/2009	\$43.990	12.01/2009	\$44.720	06/01/2010	\$45.550			
						12/01/2010	\$46.380							
OTHER POW	ER DRIV	EN EQUIPME	NT - CLASS II			06/01/2009	\$57,090	12.01/2009	\$58.190	06.01/2010	\$59,430			
						12/01/2010	\$60,680							
PAINTER (B)	RID GES /T	ANKS)				07/01/2009	\$62,260	01.01/2010	\$63.410					
APPRED	SIEE: I	ANTER - Local	135 Zona 2											
Ratio	Sup	1	2	3	4	5	6	7	8					
11	%	50 .00	35.00	60.00	65.00	70.00	75.00	80.00	90.00					
						Steps and	750 has.							
NEW paint rat	ore of surf e shall be	aces to be pain	ded are new cons	truction,		07.01/2009	\$53.160	01.01/2010	\$54310					
R.atio	Sup	1	2	3	4	5	4	7	8					
11	%	50 .00	33.00	60.00	65,00	70.00	75.00	80.00	90.00					
						Steps am	750 has.							
PAINTER (SI APPREI		S ANDBLAST PAINTER - Local	THE SECTION OF THE PARTY OF THE			07/01/2009	\$51.220	01.01.2010	\$52370					
Ratio	Sup	1	2	3	+	3	36	7	8					
11	9%	50.00	55.00	60.00	65,00	70.00	75.00	80.00	90.00					
						Steps and	750 has.							
PAINTER (TE	RAFFIC M	(ARKINŒ)				06.01/2009 12.01/2010	\$46.100 \$49.350	12.01/2009 06.01/2011	\$47.100 \$50.350	06.01/2010 12.01/2011	\$48.100 \$51.600			
paint rate shall	ore of sunfi lbe used.		te d'are new cons	truction, NEW		07.01/2009	\$51.760	01.01.2010	\$52910					
Ratio	Stop	1	2	3	+	3	36	7	8					
11	%	50.00	55.00	60.00	45.00	70.00	75.00	80.00	90.00					
						Steps and	750 has.							

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Issue Date: 07/23/2009 20090722-055 Wage Request Number: Page 6 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	ation					Effective Da	tes and Tota	I Kates			
APPRE	NICE: P	AINTER - Local	135 Zone 2								
Ratio	Sup	1	2	3	+	3		7	8		
11	%	50.00	55.00	60.00	65.00	70.00	75.00	80.00	90.00		
						Steps and	750 has.				
PANEL & PI	CKUPTRU	JCKS DRIVE	R			12/01/2008	\$42,090				
PIER AND D DECK)	ock con	STRUCTOR(UNDERPINNI	IG AND		08.01/2008 08.01/2011	\$58,090 \$65,340	08.01/2009	\$60.240	08.01.2010	\$62.590
PILE DRIVE	R					08.01/2008 08.01/2011	\$58.090 \$65.340	08.01/2009	\$60.240	08/01/2010	\$62.590
APPRE	NICE: F	ALE DRIVER-1	Local 54 Zone 1				*****				
Ratio	Stop	1	2	3	+	5	6	7	8		
13	%	60.00	65.00	70.00	75.00	80.00	85.00	90.00	95.00		
PIPEFITTER	& STEAM	FITTER				03.01/2009	\$65.980	09.01/2009	\$67.480	03/01/2010	\$68,730
APPRE	NICE: F	PPEFII IER L	cal537								
R.atio	Sup	1	2	3	+	5					
**	%	40.00	45.00	60.00	70.00	80.00					
**1:3;3	3:15; 1:10 t	ополен				Steps am	l ya RefiigAC L	Inchanic Stope & B	in Same as above		
Rafrig#	C Machania	s **1 1;1:2;2 * ;3	:4; 4 :8;5:10; 4:12; 7 <u>1</u>	4;817;920;1023	(Max)						
PIPELAYER						06.01/2009	\$46.350	12.01/2009	\$47.350	06/01/2010	\$48.350
						12.01/2010	\$49.600	06.01/2011	\$50,600	12/01/2011	\$51.850
PLUMBERS	& GAS FIT	TERS				03/01/2009	\$65,500	09.01/2009	\$67,000	03/01/2010	\$68.250
APPRE	NICE: F	LUMBER - Los	a 12								
Ratio	Sup	1	2	3	4	3					
**	%	35.00	00.04	55.00	65,00	75.00					
**1:2; 2	2:4; 3:10; 4:1	14;519				Steps an	l year Step + w	lianse-70; Step 5 v	w/licerse-80		
PNEUMATIO	CONTRO	OLS (TEMP.)				03/01/2009	\$65.980	09,01/2009	\$67.480	03.01/2010	\$68.730
PNEUMATIO	DRILL/T	OOL OPERAT	ror:			06.01/2009	\$46350	12.01/2009	\$47.350	06/01/2010	\$48350
						12.01/2010	\$49,600	06.01/2011	\$50,600	12/01/2011	\$51.850
POWDERMA	N& BLA	STER				06.01/2009	\$47.100	12.01/2009	\$48.100	06/01/2010	\$49.100
						12.01/2010	\$50.350	06,01/2011	\$51.350	12/01/2011	\$52,600
POWERSHO	VEL/DER	RICK/TRENC	HING MACHIN	Œ		06.01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59.780
						12.01/2010	\$61,030				
PUMP OPER	ATOR (CO	(NCRETE				06/01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59,780
						12.01/2010	\$61,030				
PUMP OPER	AT OR (DE	ewatering,	OTHER)			06/01/2009	\$47,070	12.01/2009	\$47.890	06/01/2010	\$48.810
						12.01/2010	\$49.740				
READY-MIX	CONCRE	TEDRIVER				05/01/2009	\$40.520	05.01/2010	\$41.080	05/01/2011	\$41.690

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 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 7 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	tion					Effective Dates and Total Rates								
RECLAIMER	S					06.01/2009	\$57,090	12/01/2009	\$58.190	06/01/2010	\$59,430			
						12.01/2010	\$60,680							
RESIDENTLA	T MOO	D FRAME CAR	PENTER **			04.01/2009	\$35,620							
			enter classificatio											
			residences that o	io not exceed										
four stories in RIDE-ON MO		ne oasament ED BUGGY OP	ERATOR			06.01/2009	\$46.350	12.01.2009	\$47.350	06/01/2010	\$48350			
						12.01/2010	\$49.600	06,01/2011	\$50,600	12,01,2011	\$51.850			
ROLLER SPE	READER	/MULCHING I	MACHINE			06.01/2009	\$57,090	12,01,2009	\$58.190	06/01/2010	\$59,430			
						12.01/2010	\$60,680							
ROOFER (Inc	Roofer	Waterproofing &	Roofer Damproo	fg)		02.01/2009	\$53.860							
		ROOFER-Local												
Ratio	Sup	1	2	3	+	5								
••	%	50 .00	60.00	65.00	75.00	85.00								
**1:5, 2	:6 -10 fte	maffarl 10 (or po	rtion the mo f)			Suplis	2000 hrs ; Stupe 2	-5 am 1000 hrs.						
				1:4; Themafer1:1										
SHEETMET A	L WOR	KER				02/01/2009	\$61,020	08/01/2009	\$62,270	02/01/2010	\$63.520			
APPRE	NIEE:	SHEET METAL	WORKER - Local	17-A										
Ratio	Sup	1	2	3	+	5		7						
1.*	%	40.00	+5.00	50.00	00.00	65,00	75.00	85.00						
						Staps 1-3	am lyear fer	4-7am (mos.						
SIGN ERECT	OR					06.01/2009	\$37.780							
APPRE	NIL'E:	SIGN ERECTOR	- Local35 Zona 2											
Ratio	Sup	1	2	3	4	:3		7	8	9				
11	%	50 .00	55.00	60.00	65.00	70.00	75.00	80.00	85.00	90.00				
						Steps an	at mos.							
SLATE/TILI	E/PREC	AST CONCRE	TE ROOFER			02.01/2009	\$54.110							
SPECIALIZE	D EART	H MOVING E	QUIP < 35 TONS			12.01/2008	\$42,550							
SPECIALIZE	D EART	H MOVING E	OUIP > 35 TONS			12.01/2008	\$42.840							
SPRINKLER	FITTER					03/16/2009	\$66.950	09/16/2009	\$68.450	03/16/2010	\$69.700			
APPRE	NIL'E:	SPRINKLER FI	TER-Local550						55		70			
Ratio	Sup	1	2	3		5	ě.	7	8	9	10			
11	%	40.00	+5.00	50.00	55.00	0 0,02	65,00	70.00	75.00	80.00	85.00			
STEAM BOII	LER OPI	RATOR				06/01/2009	\$57,090	12/01/2009	\$58.190	06/01/2010	\$59.430			
						12.01/2010	\$60,680							
TAMPERS, S	ELF-PR	OPELLED OR T	RACTOR DRA	WN		06.01/2009	\$57,090	12/01/2009	\$58.190	06/01/2010	\$59,430			
						12.01/2010	\$60,680							

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27

Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 8 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION

Job Location: LONGFELLOW ROAD PUMP STATION

Classifica	tion	tion Effective Dates and Total Rates									
TELECOMM	UNICATI	ON TECHNIC	IAN			03/01/2009	\$51,620	09.01/2009	\$52.5 4 0	03/01/2010	\$53.470
						09/01/2010	\$54.410	03.01/2011	\$55330		
APPRE	NIL'E:	HELEC OMMUN	ICATION TECHNI	CIAN - Local 103							
Ratio .	Step	1	2	3	+	35		7	8		
11	%	40.00	+5.00	50.00	55.00	60,00	45,00	75.00	80.00		
TERRAZZO I	FINISHEE	S				02/01/2009	\$64.260	08.01/2009	\$66,060	02/01/2010	\$66.950
						08.01/2010	\$68.850	02.01/2011	\$69.840	08.01/2011	\$71940
						02/01/2012	\$72,930				
APPRE	NICE: 1	MARBLE-TILE-	TERRAZZO FINIS	IER - Local 3 Mar	ble & Tile						
Ratio	Stop	1	2	3	+	5					
13	%	50 .00	00.00	70.00	80.00	90.00					
						Steps an	800 has.				
TEST BORIN	G DRILL	ER				06.01/2009	\$47.500	12.01/2009	\$48,500	06.01.2010	\$49.500
						12/01/2010	\$50.750	06.01/2011	\$51.750	12.01.2011	\$53,000
TEST BORIN	G DRILL	ER HELPER				06.01/2009	\$46.220	12.01/2009	\$47.220	06/01/2010	\$48.220
						12.01/2010	\$49,470	06.01/2011	\$50.470	12.01/2011	\$51.720
TEST BORIN	GLABOR	RER				06/01/2009	\$46.100	12/01/2009	\$47.100	06/01/2010	\$48.100
						12.01/2010	\$49.350	06.01/2011	\$50.350	12/01/2011	\$51.600
TRACTORS/	PORTABI	ESTEAM GE	NERATORS			06.01/2009	\$57,090	12.01/2009	\$58.190	06/01/2010	\$59,430
						12.01/2010	\$60,680				
TRAILERS F	OR EART	H MOVING E	QUIPMENT			12.01/2008	\$43,130				
TUNNEL WO	RK- COI	MPRESSED A	IR.			06/01/2009	\$58,430	12.01/2009	\$59,680	06/01/2010	\$60.930
						12.01/2010	\$62,180	06.01/2011	\$63,430	12.01/2011	\$64.680
TUNNEL WO	RK- COI	MPRESSED A	IR (HAZ. WAST)	E)		06/01/2009	\$60,430	12.01/2009	\$61.680	06/01/2010	\$62,930
						12.01/2010	\$64.180	06/01/2011	\$65,430	12/01/2011	\$66.680
TUNNEL WO	RK - FRE	E AIR				06/01/2009	\$50,500	12/01/2009	\$51.750	06/01/2010	\$53,000
						12.01/2010	\$54.250	06.01/2011	\$55,500	12/01/2011	\$56.750
TUNNEL WO	RK - FRE	E AIR (HAZ.	WASTE)			06.01/2009	\$52,500	12.01/2009	\$53.750	06/01/2010	\$55,000
						12.01/2010	\$56.250	06.01/2011	\$57.500	12.01/2011	\$58.750
VAC-HAUL						12.01/2008	\$42,550				
WAGONDR	ILL OPER	ATOR				06/01/2009	\$46350	12/01/2009	\$47.350	06/01/2010	\$48.350
						12/01/2010	\$49.600	06/01/2011	\$50,600	12.01/2011	\$51.850
WASTE WAT	TER PUM	POPERATOR				06.01/2009	\$57.410	12.01/2009	\$58.530	06/01/2010	\$59.780
						12/01/2010	\$61.030				
WATER MET	ER INST.	ALLER				03.01/2009	\$65,500	09.01/2009	\$67,000	03/01/2010	\$68.250

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27

Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

 Issue Date:
 07/23/2009
 Wage Request Number:
 20090722-055
 Page 9 of 10



DIVISION OF OCCUPATIONAL SAFETY

Prevailing Wage Rates

As determined by the Commissioner under the provisions of the Massachusetts General Laws, Chapter 149, Sections 26 to 27H



Awarding Authority: CITY OF NEWTON

Contract Number: 1003 City/Town: NEWTON

Description Of Work: #2 WASTEWATER PUMP INSTALLATION Job Location: LONGFELLOW ROAD PUMP STATION

Classification Effective Dates and Total Rates

Additional Apprentice Information:

Minimum wage rates for apprentices employed on public works projects are listed above as a percentage of the pre-determine dhourly wage rate established by the Comm is sinner under the provisions of the M.G.L. c 23, ss. 26-27D. Apprentice ratios are established by the Division of Apprenticeship Training pursuant to M.G.L. c.23, ss. 11E-11L.

All apprentices must be registered with the Division of Apprenticeship Training in accordance with M.G.L. c23, ss. 11E-11L.

All steps are six months (1000 hours) mless otherwise specificed**.

- Ratios are expressed in allowable number of apprentices to journeym en or fraction there of.
- Multiple ratios are listed in the comment field.
 The job site ratio of 2 apprentices(App) for every 3 journeymen(JM) is allowed as follows: 1 JM:1 App; 2-3 JM:2 App; 4-6 JM:4 App; 7-9 JM:6 App; 10-12 JM:8 App; 13-15 JM: 10 App; etc.

This wage schedule must be posted at the work site in accordance with M.G.L. ch. 149, sec. 27 Failure of the employer to pay "prevailing wage rates," which are the minimum wage rates listed above, on public works projects is a violation of M.G.L. ch. 149, sec. 27B. Employees not receiving such rates should report the violation to the Office of Fair Labor and Business Practices, 100 Cambridge Street, Boston, MA 02108; Tel: 617-727-3465.

Issue Date: 07/23/2009 Wage Request Number: 20090722-055 Page 10 of 10

The Massachusetts Prevailing Wage Law M.G.L. ch. 149, §§ 26 – 27

NOTICE TO AWARDING AUTHORITIES

- The enclosed wage schedule applies only to the specific project listed at the top and will be updated for any public construction project lasting longer than one (1) year.
- You should request an updated wage schedule from the Division of Occupational Safety if you have not opened bids or selected a contractor within 90 days of the date of issuance of the enclosed wage schedule.
- > The wage schedule shall be incorporated in any advertisement or call for bids for the project for which it has been issued.
- Once a contractor has been selected by the awarding authority, the wage schedule shall be made a part of the contract for that project.

NOTICE TO CONTRACTORS

- The enclosed wage schedule, and any updated schedule, must be posted in a conspicuous place at the work site during the life of the project.
- The wages listed on the enclosed wage schedule must be paid to employees on public works projects regardless of whether they are employed by the prime contractor, a filed sub-bidder, or any sub-contractor.
- The enclosed wage schedule applies to all phases of the project including the final clean-up. Contractors whose only role is to perform final clean-up must pay their employees according to this wage schedule.
- All apprentices must be registered with the Massachusetts Division of Apprentice Training in order to be paid at the reduced apprentice rates. If a worker is not registered with the Division of Apprentice Training, they must be paid the "total rate" listed on the wage schedule regardless of experience or skill level. For further information, please call (617) 727-3486 or write to the Division of Apprentice Training, 399 Washington Street, 4th Floor, Boston, MA 02108

WEEKLY PAYROLL RECORDS REPORT & STATEMENT OF COMPLIANCE

In accordance with Massachusetts General Law c149, §27B, a true and accurate record must be kept of all persons employed on the public works project for which the enclosed rates have been provided. A Payroll Form has been printed on the reverse of this page and includes all the information required to be kept by law. Every contractor or subcontractor is required to keep these records and preserve them for a period of three years from the date of completion of the contract.

In addition, every contractor and subcontractor is required to submit a copy of their weekly payroll records to the awarding authority. This is required to be done on a weekly basis. Once collected, the awarding authority is also required to preserve those records for three years.

In addition, each such contractor, subcontractor or public body shall furnish to the Department of Labor & Workforce Development/Division of Occupational Safety within fifteen days after completion of its portion of the work a statement, executed by the contractor, subcontractor or public body who supervises the payment of wages, in the following form:

STATEMENT OF COMPLIANCE

		_, 200
Ī		
(Name of signatory party) (Title) do hereby state:		_
That I pay or supervise the payment of the persons employ on the on the	•	
(Contractor, subcontractor or public body) and that all mechanics and apprentices, teamsters, chauffer said project have been paid in accordance with wages dete of sections twenty-six and twenty-seven of chapter one hur General Laws.	(Building or project) urs and laborers employed on rmined under the provisions	
	Signature	
	Title	

DIVISION OF OCCUPATIONAL SAFETY, 399 WASHINGTON STREET, 5TH FL., BOSTON, MA. 02108

WEEKLY PAYROLL REPORT FORM

Company Name:

Awarding Auth.:

Project Name:

Work Week Ending:

Prime Contractor

Subcontractor List Prime Contractor:

Employer Signature:

Print Name & Title:

					Address	Employee Name &
	÷				WOLK CIASILICATOL	Work Classification
			S			
			Z		Hours Worked	
			Н			
			W			
			Н			
			ম			
			S			
					Tot. Hrs.	(A)
					Base Wage	(A) (B)
				(C) Health & Welfare		Employ
				(D) Pension		Employer Contributions
				(E) Supp. Unemp		
			ia la		Total Wage (prev. wage)	(F) [B+C+D+E]
ja					Total Amount	(G) [A*F]
				M T W T F	M T W T F S Health & Supp. Welfare Pension Unemp	Tot. Base Health & Welfare Pension

NOTE: Every contractor and subcontractor is required to submit a copy of their weekly payroll records to the awarding authority.

PUMP STATION REPAIRS LONGFELLOW ROAD PUMP STATION

SPECIAL CONDITIONS

1.0 PROJECT SITE

A. The area of work shall be the LONGFELLOW ROAD Pump Station, LONGFELLOW ROAD Road, Newton, MA.

2.0 TIME FOR COMPLETION

A. The work shall be commenced at the time stipulated in the Notice to Proceed to the Contractor. All work with shall be fully complete within three hundred sixty (360) calander days from the stipulated date.

3.0 PAYMENT

A. Payment to the Contractor shall be made in accordance with the provisions of Paragraph 2.6 of the Genaral Conditions. The amount of retainage established for this contract shall be 5%.

4.0 LIQUIDATED DAMAGES

A. As actual damages for any delay in completion are impossible to determine, the Contractor and his/her sureties shall be liable for and shall pay <u>fifty dollars (\$50.00)</u> as fixed, and agreed liquidated damages for each calendar day of delay beyond the completion date stated in the Notice to Proceed until the work is brought to full and accepted completion.

5.0 COMMUNICATIONS

- A. All notices, demands, requests, instructions, approvals and claims must be in writing.
- B. Any such notice shall be deemed to have been given as of the time of delivery, or of actual receipt in the case of telegrams or, in the case of mailing, when it should have been received in due course of post.
- C. For communicating purposes, the office address of the Contractor shall be that stated on the signature page of the contract; that of the City shall be as stated in the Notice to Contractors. Any subsequent change in address of either party shall be communicated to the other in writing.

6.0 PLANS AND SPECIFICATIONS

A. The City will furnish to the Contractor, without charge, all copies of the specifications reasonably necessary in the performance of the contract work.

7.0 COORDINATION

The Contractor shall:

- A. Supply to the City the name and telephone number of a responsible person who may be contacted during off-hour emergencies on the project.
- B. Cooperate at all times with the City and the Project Manager, and ensure the cooperation of his key personnel and that of his subcontractors.
- C. Provide 24 hour minimum notice to building management to prepare for access to any site area.

8.0 CONDUCT OF THE WORK

A. The work must be completed in a continuous uninterrupted operation. The Contractor must use sufficient men and adequate equipment to complete all the necessary work requirements within a minimum period of time.

- B. The work shall be conducted between the hours of 8:00 a.m. and 4:30 p.m. on Monday through Friday. No work shall be done on holidays, Saturdays or Sundays other than for emergencies, or unless specifically authorized by the City.
- C. The Contractor is responsible for the security of partially completed work until the project is finally accepted by the City.

9.0 ALTERATION

A. The Contractor shall patch, repair and/or replace all existing materials and surfaces remaining exposed after installation of new work which have been affected by alteration or removal of existing work. All patch and repair work shall match existing.

10.0 GENERAL DIRECTIONS

A. Damage to Persons and Property

Any damage to buildings, roads, public roads, bituminous concrete areas, fences, lawn areas, trees, shrubbery, electric or telephone poles, underground utilities, etc., shall be repaired by the Contractor at his own expense. Damaged property shall be returned to its original condition prior to the damages within a reasonable time period, except all utility outages shall be repaired immediately.

B. Protection of Persons and Property

The Contractor shall, at all times, leave an unobstructed way along the roadways and walks, and shall maintain barriers and lights for the protection of all persons and property in all locations where he has materials stored or work going on, and during the entire time such work is going on or material is stored.

C. The Contractor shall at the end of each work day leave the fields in usable condition. There shall be no open holes/trenches or exposed irrigation heads that could pose a trip hazard or potential injury to persons using the fields.

D. Care of Work

All work is to be carefully protected so that no injury will come to it from water, frost, accident, or any other cause and any injury which may come to any of the work shall be repaired immediately by the Contractor at his own expense and without additional cost to the City. This shall also apply to any abutting or adjoining work on premises. The Contractor shall be responsible for any damage and in the event of such damage, the Contractor shall repair the damage immediately at his own cost and without additional cost to the City.

E. Removal of Debris

Debris of any nature shall be completely removed from the site at the end of each days work and disposed of in accordance with all Federal, State and local regulations.

F. The Contractor is responsible for the security of all work until it is accepted by the City.

11.0 DELETED

12.0 SUBMISSION OF PAYROLLS

A. The Contractor shall, with each monthly invoice submitted during the term of this Contract, submit to the City two (2) legible copies of his payrolls documenting the wages paid to all employees performing on site labor relating to the work of this Contract. These copies shall be prepared on forms supplied by the City.

13.0 DRAWINGS

A. The drawings attached herein and such drawings as may be issued per addendum, shall constitute an integral part of this section and shall serve as the working drawings.

- B. Drawings shall not be scaled. Field verification is directed since actual locations, dimensions and levels are existing.
- C. All items not specifically mentioned in the specifications or noted on the drawings, but which are obviously necessary to make a complete working installation, shall be included.

14.0 MATERIALS

- A. Unless specifically so stated to the contrary the use of a manufacturer's name or style number is not restrictive, and is intended solely as an identification of the type and quality of the materials and services required. In all cases, the words "or approved equal" if not inserted are implied.
- B. An item equal to that named or described in the specifications may upon written approval of the City be furnished by the Contractor. An item shall be considered equal to the item so named or described if (1) it is at least equal in quality, durability, appearance, strength and design; (2) it will perform at least equally the function imposed by the general design for the public work being contracted for or the material being purchased; (3) it conforms substantially, even with deviations, to the detailed requirements for the item in the specifications.
- C. The name and identification of all materials other than the one specifically named shall be submitted to the City in writing for approval, prior to purchase, use or fabrication of such items. Subject to the provisions of M.G.L. Ch. 30, Sec. 39J, approval shall be at the sole discretion of the City, shall be in writing to be effective, and the decision of the City shall be final. The City may require tests of all materials so submitted to establish quality standards at the Contractor's expense.
- D. For the use of material other than the one specified, the Contractor shall assume the cost of and responsibility for satisfactorily accomplishing all changes in the work as shown. All directions, specifications and recommendations by manufacturers for the installation, handling, storing, adjustment, and operation of their equipment shall be complied with and responsibility for proper performance shall continue to rest with the Contractor.
- E. Except as otherwise provided for by the provisions of M.G.L. Ch. 30, Sec. 39J, the Contractor shall not have any right of appeal from the decision of the City condemning any materials furnished if the Contractor fails to obtain the approval for substitution in accordance with these provisions. If any substitution is more costly, the Contracotr shall pay for such costs

15.0 WARRANTY AND INDEMNIFICATION

A. In addition to other guarantees or warranties required under law or other sections of the specification, the Contractor warrants all materials furnished and labor performed under this Contract to be free from defects or errors in workmanship or installation for a period of one year from the date of Completion of the work, as certified by the Project Manager. The Contractor shall indemnify the Authority for the full cost of any damage to the property that may result by reason of such defects or errors and shall indemnify the Authority from and against any and all claims, demands. losses, costs, expenses, liabilities and damages, including reasonable attorney's fees and expenses, arising out of or on account of this Contract, including but not limited to claims brought against the Authority for alleged infringement of patents based upon any methods of construction or application of upon materials furnished under the Contract.

CITY OF NEWTON DEPARTMENT OF PUBLIC WORKS

SPECIFIC REQUIREMENTS OF THE CONTRACT

LONGFELLOW ROAD PUMP STATION REPAIRS

SECTION 01270

MEASUREMENT AND PAYMENT

1. GENERAL

- A. The following sections describe the measurement and payment for the work to be done under the respective items listed in the FORM OF GENERAL BID.
- B. The lump sum price stated in the FORM OF GENERAL BID shall constitute full compensation as herein specified, for all of the work completed in accordance with the specifications. All other activities required in connection with performance of the work, including all work required under Division 1, GENERAL REQUIREMENTS, whether described in the contract documents or mandated by applicable codes, permits and laws, will not be separately paid for unless specifically provided for in the form of general bid, but will be considered to be incidental to performance of the overall project.

2. ITEM 1

The lump sum price for Item 1 shall constitute full compensation for furnishing all labor, materials, tools and equipment for constructing the project, complete, as called for in the specifications.

ITEM 2 - ALTERNATE

The lump sum price for Item 2 shall constitute full compensation for furnishing all labor, materials, tools and equipment for constructing this item, complete, as called for in the specifications.

SECTION 01014

SCOPE AND SEQUENCE OF WORK

PART 1 - GENERAL

1.01 DESCRIPTION:

A. This Section covers the scope and sequence of work for the pumping station improvements.

1.02 WORK INCLUDED:

A. SCOPE:

The Contractor shall furnish all labor, materials, equipment and incidentals required to complete the work as specified herein. The work includes but is not limited to furnishing and installing the following:

- 1. Remove and replace pump and motor no. 3.
- 2. As a bid alternate, remove the existing starter for pump no. 3 and install a new 150-horsepower adjustable frequency drive (AFD) above the existing motor control center (MCC).

1.03 PROTECTION OF EXISTING PUMP STATION:

- A. Any work that will interfere with the operation of the existing pumping station must be approved by the Owner. One (1) week written notice shall be given to the Owner before the date approval is required.
- B. If work done by the Contractor interferes with the existing pumping station such that operation of the stations is impaired; the Contractor shall correct the problems to the satisfaction of the Owner, at no additional cost to Owner.

1.04 SEQUENCING:

- A. The following is a suggested order of construction concerning the pumping station construction. It does not purport to cover all work, which may be required to keep the existing station operational during construction.
 - 1. Remove and replace pump and motor no. 3.
 - 2. Remove the existing starter for pump no. 3 and install a new 150-horsepower adjustable frequency drive (AFD) above the existing MCC (bid alternate).
 - 3. Start-up and testing.
 - 4. Removal of salvageable equipment.
 - 5. Clean-up station.

1.05 DEMOLITION:

- A. The demolition work shall include the removal of salvageable equipment as designated by the Owner.
- 1.06 SUBMITTALS: IN ACCORDANCE WITH REQUIREMENTS OF GENERAL SPECIFICATIONS, SUBMIT THE FOLLOWING:
- A. Submit a demolition plan to the Owner for review, describing the proposed sequence, methods, and equipment for the demolition and disposal.
 - B. Do not proceed with demolition until the Owner has given written comments on the demolition plan and authorization to proceed.

PART 2 - PRODUCTS: NOT APPLICABLE

PART 3 - EXECUTION

3.01 DEMOLITION:

- A. Arrange with and perform work required by utility companies and municipal departments for discontinuance or interruptions of utility services due to demolition work.
- B. The Contractor shall take precautions to protect the existing equipment and structures from damage during removal of equipment and materials.

3.02 DISPOSITION OF SALVAGEABLE EQUIPMENT:

A. The Contractor shall remove and dispose of all salvageable equipment from the existing pumping station, as designated by the Owner.

3.03 DISPOSAL OF DEMOLITION SPOIL:

A. The Owner has the <u>option</u> of retaining ownership on equipment and materials being removed. All other equipment and materials being removed, not to be retained by the Owner, shall become the property of the Contractor and shall be disposed of by the Contractor in accordance with all applicable regulations, at no additional cost to the Owner.

SECTION 11310

WASTEWATER PUMPING EQUIPMENT

PART 1 - GENERAL

1.01 WORK INCLUDED:

This section covers the furnishing, installation and testing of the wastewater pumps motor, drives and appurtenances for the A. LONGFELLOW ROAD Pump Station as herein specified.

1.02 RELATED WORK:

Electrical Work is included in Division 16. A.

1.03 SYSTEM DESCRIPTION:

- A. The wastewater pumping equipment shall consist of a pump and motor to replace the existing pump and motor for the pump station listed above with parameters as specified in the pump and motor schedule (2.02), including frame, seal, coupling, and electrical system interface, and all associated equipment and accessories required to make a complete system.
- B. This specification directs special attention to certain features, but does not purport to cover all details of the design, manufacture or installation of the pumping unit. Final responsibility for supplying and installing pumping equipment which functions as specified herein rests with the Contractor and his suppliers.
- B. The Contractor shall be required to make the necessary piping modifications on the suction and discharge sides of each pump and on the existing concrete pads to allow proper installation of the new pump.

1.04 **QUALITY ASSURANCE:**

ALL EQUIPMENT SHALL CONFORM TO THE FOLLOWING CRITERIA: A.

- 1. Equipment shall be manufacturer's standard products presently in commercial production.
- 2. Conform to Hydraulic Institute Standards.
- All equipment specified under this Section shall be furnished by a single supplier and shall be products of manufacturers regularly engaged in the production of said equipment. The supplier shall have the sole responsibility for proper functioning of the complete pumping unit.
- Any reference to a specific manufacturer or model number is for the purpose of establishing a quality or parameter for specification writing and is not to be considered proprietary. In all cases any source or device that has the quality and operating capabilities specified may be acceptable.
- 5. Conform to requirements for materials, installation and equipment approvals of state, local, Underwriter's Laboratories, Inc., or other applicable codes, whether or not called for on the drawings or in the specifications.
- Workmanship shall be first class in all respects. 6.
- 7. Base the use of unspecified materials on their continuous and successful employment under similar conditions, as called for in this section.
- 8. The electrical drive equipment specified herein (including drive controller and induction motor) shall be designed and sized by the supplier, who shall assume responsibility for the correct operation of the system. The supplier shall have successfully manufactured, installed and started-up at least 10 systems similar to this installation in the past 5 years.

B. MANUFACTURER'S QUALIFICATIONS:

- 1. On request from the Owner, the pump manufacturer shall demonstrate proof of financial responsibility with respect to performance and delivery date.
- 2. On request from the Owner, the pump manufacturer shall provide proof or evidence of facilities, equipment and skills required to produce the equipment specified herein.
- 3. The manufacturer shall provide the supervisory service of a factory trained Owner, who is specifically trained on the type of equipment supplied, for a period of not less than one 8-hour day to assist in installation of the pumping equipment and related appurtenances, to provide initial startup of each pump and to instruct the Owner's operating personnel in the operation and maintenance of the equipment provided. The specified time period is a minimum time requirement. The actual time required to complete the specified tasks may take longer, but shall be completed at no additional cost to the Owner.

C. FACTORY TESTS:

1. General:

Six (6) copies of certified Shop Test results for the pump, stamped and approved by a Registered Professional Owner, in the appropriate field, shall be provided to the Owner.

2. Pump Testing Requirements:

- a. The pump manufacturer shall not ship any pump until after the certified pump performance tests have been submitted to and reviewed by the Owner.
- b. Hydrostatic testing of the pump casing, suction cover and stuffing box cover shall be performed after assembly of the pump. The minimum test pressure shall be the greater of: one point five (1.50) times the shutoff head at maximum speed with full diameter impeller, or one hundred twenty-five (125) psi, whichever is greater. Certified hydrostatic test results shall be submitted to the Owner prior to pump performance testing.
- c. The pump to be furnished under this Section shall be performance tested on water at the pump manufacturer's plant, before shipment. The purpose of performance testing shall be to prove that the pump to be supplied conforms to the Specification requirements, and that the pump can properly operate throughout the entire pump envelope. Tests shall conform to the Standards of the Hydraulic Institute, except as specifically modified herein.
 - 1. Head
 - 2. Capacity
 - 3. Brake horsepower
 - 4. Efficiency
 - 5. Vibration
- d. After the completion of the pump performance testing, the pump shall be operated at maximum speed against a closed discharge valve for a minimum of two (2) minutes. After this test is completed, the Owner reserves the right to require that the pump suction cover be removed and an inspection made of the suction cover wear ring and the impeller wear ring. If any contact has occurred between the rings during the shutoff test operation, all pump shall be rejected.
- e. If, in the sole opinion of the Owner, any pump test indicates that the pump performance differs significantly from the Specification requirements and/or the previously submitted pump performance data, the cause of the difference shall be determined and corrected by the manufacturer. The pump shall be retested until it meets the performance requirements specified herein.

3. Motor Testing Requirements

- a. Pump motor shall be designed and manufactured according to the criteria specified in subsection 2.03 of this Section.
- b. Pump motor shall meet or exceed all applicable NEMA standards.

- c. The pump motor to be furnished under this Section shall be tested according to generally recognized "Standard Commercial Tests."
- d. The motor manufacturer shall not ship any motor until after the motor test information has been submitted to and reviewed by the Owner.
- D. Field acceptance tests shall be performed as specified in PART 3 EXECUTION.

1.05 REFERENCES:

A. The latest editions of the following standards form a part of this specification:

American	National	Standard	Institute	(ANSI)
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ANSI	A21.10	Standard for Gray-Iron and Ductile Iron Fittings, 3-in. through 38-in. for Water and Other Liquids.
ANSI	A21.11	Standard for Rubber-Gasket Joints for Ductile Cast-Iron and Gray-Iron Pressure Pipe and Fittings.
ANSI	A21.15	Standard for Flanged Cast-Iron and Ductile-Iron Pipe with Threaded Flanges.
ANSI	A21.51	Ductile-Iron Pipe Centrifugally Cast in Metal Molds or Sand-Lined Molds, for Water or Other Liquids.

American Society for Testing and Materials (ASTM)

ASTM A48 Specifications for Gray-Iron Castings.

ASTM A53 Specifications for Pipe, Steel, Black and Hot-dipped, Zinc Coated, Welded and Seamless.

ASTM A108 Steel Bars, Carbon, Cold Finished, Standard Quality

ASTM D429 Rubber Property - Adhesion to Rigid Substrates

ASTM D1785 Polyvinyl Chloride (PVC) Plastic Pipe, Schedules 40, 80, and 120.

Massachusetts Electrical Code (MEC)

527 CMR 12.00 Massachusetts Electrical Code.

National Electric Manufacturer's Association (NEMA)

NEMA MG1 Motors and Generators NEMA MG1 Motors and Generators

1.06 SUBMITTALS: IN ACCORDANCE WITH REQUIREMENTS OF GENERAL SPECIFICATIONS, SUBMIT THE FOLLOWING:

- A. Prior to shipment, the Contractor shall submit six copies of the following to the <u>Owner:</u>
 - 1. Complete shop drawings showing dimensions, materials of construction, and all particulars as herein specified.
 - 2. Certified pump curve showing the actual performance of the pump to be supplied under factory testing. The pump shall be tested with actual suction elbow to be furnished for this system as specified.
 - 3. Complete Bill of Materials.
 - 4. Proposed pump hydrostatic and performance testing procedures.

- 5. Complete test results on each motor from the routine tests as defined in the NEMA standard for a motor of its class and rating to determine that it is free from electrical and mechanical defects and to provide assurance that it meets the design specifications.
- 6. Pump Motor performance data for:
 - a. Guaranteed minimum efficiency at 100%, 75%, 50%, and 25% of full load.
 - b. Guaranteed minimum Power Factor at 100%, 75%, 50%, and 25% of full load.
 - c. Locked rotor and full load current.
 - d. Starting, full load, and breakdown torque.
- 7. Pump Bulletin
- 8. Pump and motor assembly drawings and motor frame size.
- 9. Pump and motor storage and installation instructions.
- 10. Installation drawings of pump, motor, coupling, base with component weights and dimensions.
- 11. Coupling installation instructions.
- 12. Coupling Bulleting and Drawings.
- 13. Maximum reverse runaway speed calculations.
- 14. Complete pump and motor nameplate information.
- 15. Certification of factory motor balancing.
- 16. Complete functional description of all system components.
- 17. Parts lists including the manufacturer's reference and ordering numbers.
- 18. Recommended spare parts list with ordering numbers.
- B. Furnish six (6) copies of "Operation and Maintenance" manuals of all equipment supplied and installed. Manuals shall contain, but not be limited to, a complete bill of materials, a preventative maintenance schedule, a list of troubleshooting information, assembly drawings with components clearly identified and numbered, parts lists, wiring diagrams, pertinent technical data and factory service information, warranties and emergency telephone number(s).
- C. Upon completion of installation, six sets of the results of the field and acceptance tests as specified under this section of the specification shall be submitted to the Owner.
- D. Furnish equipment manufacturer's notarized certificates of conformance with the specifications stating that all materials and equipment furnished under this Section conform with all specification requirements.
- E. At the discretion and expense of the Owner, an independent vibration analysis may be conducted on the new wastewater pump. The Contractor and manufacturer will be permitted to witness the test.
- 1.07 DELIVERY, STORAGE, AND HANDLINGS:
 - A. SHIPPING:
 - 1. The wastewater pump, materials and spare parts shall be shipped complete and ready for installation except where partial disassembly is required by transportation regulations, is recommended by the manufacturer or for protection of components.

- 2. All anchor bolts and embedded items required for complete installation or mounting, holding down or supporting of equipment to be furnished under this section, including necessary location drawings and templates required to install the items in concrete, masonry, etc., shall be furnished and delivered to the site by the manufacturer of the equipment furnished under this section, for installation under other sections of the specifications. Delivery of these items shall be as required by the overall construction schedule.
- Spare parts shall be packed in containers bearing labels clearly designating contents and pieces of equipment for which intended.
- 4. Spare parts shall be delivered to the site at the same time as the basic equipment and turned over to the Owner after completion of work.

B. STORAGE:

- 1. The Contractor shall receive, store, and safeguard all equipment, materials, and spare parts at the job site.
- 2. The pump motor shall be stored on-site and protected according to motor manufacturer's recommendations until the pump is operational and accepted by the Owner.

1.08 WARRANTY:

- A. The pump and motor manufacturer shall each individually and separately warranty that the equipment they supplied under this Section fully meets the criteria specified herein, and shall further warranty that the equipment is free from all defects in materials and workmanship.
- B. The manufacturer's warrantees from defects shall contain a provision that the manufacturer shall repair or replace any defects, to the satisfaction of and at no additional cost to the Owner, for a period of twenty-four (24) months for the pump and motor, from the date of Substantial Completion of the project.

PART 2 - PRODUCTS

2.01 ACCEPTABLE MANUFACTURERS:

- A. Fairbanks Morse
- B. Cornell Pump Company C. An acceptable equivalent manufacturer.

2.02 PUMPING EQUIPMENT SCHEDULE

A. The contractor shall furnish and install vertically mounted, coupled, end suction, solids handling, centrifugal pumping unit as specified herein at the locations listed below:

<u>Description</u> <u>Quantity</u>

LONGFELLOW ROAD Pump Station

1

B. The Pump Station pump shall have the necessary characteristics and be properly selected to perform under the following operating conditions:

Design Point 5,000gpm @ 91' TDH

Minimum Efficiency over Pumping Range 75%

Minimum Horsepower 75

Maximum Allowable Operating Speed, RPM 1,200

Minimum Spherical Solid Diameter to be Passed 3 inches

The existing pump and motor has the following model and serial numbers, and characteristics:

Pump

Manufacturer:Fairbanks MorseSerial No.:K3W1-070295-3Diameter:10" Suction
10" Discharge

Motor

Manufacturer: Marathon Electric

Size: 150 horsepower, 460-volt, 3 phase, 60 hertz, 1185 rpm

Frame: 445TSC
Type: TDS
Code: G

2.03 PUMP:

A. The centrifugal pump shall be a vertical close-coupled type unit. The unit shall include pump, high ring base, coupling, coupling guard and vertical solid shaft motor.

B. PUMP BASE:

- 1. The pump shall be supported by a cast-iron or fabricated steel pedestal base with openings large enough to permit access to the suction line to the inspection opening in the suction elbow. The base shall be rugged enough to support the full weight of the pump. The legs of the pedestal base shall be of such length that the suction elbow of the pump will not touch the floor or the level foundation upon which it is anchored.
- 2. The base shall be suitable for attachment to existing foundation materials. The pump manufacturer shall investigate the existing composite pump base support foundation pads, and provide such adapter plates and/or fabricated components as necessary to result in correct alignment of pump suction and discharge nozzles to existing piping connection points. The pump manufacturer shall provide all anchorage and attachment hardware for installation, leveling and securing base to the existing composite foundation. All leveling shims, anchor bolts, and associated hardware shall be 316 stainless steel.

C. CASINGS:

- The pump casing shall be made of hard, close-grained cast iron conforming to ASTM A48, Class 30, of ample
 thickness, capable of prolonged resistance to the abrasive action of solids or foreign matter contained in the liquid
 passing through the pump. Ample and convenient access to the impeller and interior parts shall be provided by
 means of handholes, removable plates, or otherwise as approved.
- 2. Handholes shall be equipped with covers designed for easy removal. The interior surface of the covers shall be shaped to continue the contour of the interior of the casing to which it is attached so as to maintain efficiency and to prevent lodging of solids.
- 3. The high point of the casing shall be fitted with an air vent and the low point fitted with a drain.
- 4. The pump suction and discharge nozzles shall be drilled and tapped for installation of pressure gauges and the suction and discharge connections shall have flanges faced and drilled in accordance with the 125-pound American Standard.

- 5. The pump casing shall be tested under a hydrostatic head of at least 75 psi or 150 percent of the rated shut-off head, whichever is greater.
- 6. Pump design shall incorporate double suction wear rings, of the peripheral design, requiring no axial adjustment. One wear ring shall press-fit into the case, with the corresponding mating ring press fit onto the impeller. Wear rings shall be replaceable AISI 420 stainless steel.

D. SUCTION COVER / ELBOW

- 1. The suction cover/elbow shall be a separate cast piece, made of ASTM A48 Class 30 Cast Iron. The cover shall bolt in a register fit to the pump volute. The elbow shall incorporate a bolt-on contoured cleanout cover.
- 2. The suction flange shall be designed to accept an ANSI Class 125 lbs. flange of the size specified herein.

E. FRAMES:

- 1. The fronthead shall be made of close-grained cast iron conforming to ASTM A48 Class 30. The fronthead shall be cast separately and connected to the (suction elbow) combination base elbow).
- 2. The back head adapter shall be cast iron construction, flanged and machined on both ends to maintain alignment between the pump and driver and to eliminate vibration. The back head frame shall be built to allow for complete removal of bearings, shaft and impeller by unbolting it from the volute casing.
- 3. The main frame shall be made of hard, close-grained cast iron and shall be fitted to the casing with machine-faced joints. The design shall be heavy and rigid, so as to resist safely and without distortion the stresses due to impeller thrust and the bearing loads. The frame shall have housings for two sets of grease-lubricated ball or roller bearings. If ball bearings are used, at least one set shall be a combination radial and thrust bearing. Bearings shall be mounted in dust and moistureproof enclosures incorporating lip-type grease seal in contact with the shaft to prevent the entrance of contaminants. Jacking bolts for external impeller adjustments are required. Zerk-type grease fittings for bearing lubrication shall be supplied at the bearing housings.
- 4. A suitable drain shall be provided at the low point of the main frame.

F. SHAFTS:

- 1. The pump shafts shall be high strength, AISI 1144 steel or better, "Stressproof" treated for hardness and strength. It shall be Ownered to transmit full driver horsepower with a liberal safety factor and minimum deflection. The shaft shall be accurately machined and polished, and statically and dynamically balanced. Minimum shaft diameter shall be not less than 2.125 inches. All steps in shaft diameter shall be radiused.
- 2. Shaft deflection shall not exceed 0.002 inches, as measured at end of suction wear ring, when operating at design conditions. Pump manufacturer shall submit a shafting stress analysis in support of same.
- A replaceable shaft sleeve shall be provided, extending through the stuffing box, positively locked to prevent rotation, and sealed to the shaft utilizing an O-ring fit into an internal groove on the sleeve. The sleeve shall be a minimum of 0.375" larger in O.D. than the shaft, and be constructed of stainless steel, heat-treated to a minimum Brinell hardness of 350.

G. IMPELLER:

- 1. The impeller shall satisfy the physical and tensile strength requirements of ASTM A48, Class 30.
- 2. The impeller shall be single-suction, symmetrical and statically and dynamically balanced, and of non-clog design. Non-clog impellers shall be built with a minimum number of vanes or blades and shall allow impeller waterways and clearance between the maximum size impeller periphery and volute cutwater to pass spherical solids as indicated in Section 2.02. Provision shall be made for external impeller adjustment without the use of shims.

- 3. Impeller vanes shall be free of sharp edges and waterways shall have smooth contours and well-rounded entrances. The impeller hub shall not have ports for reduction of thrust on the impeller. The impeller shall be key-seated and held securely to the shaft using a stainless steel washer and stainless steel lockscrew, or by an equally efficient method which shall permit easy removal of the impeller and shall also be capable of holding securely in the event of pump reversal to full runaway speed. No positioning adjustment shall be required.
- 4. The impeller shall accept a radial press-fit wear ring which requires no "on site" external adjustments. External adjustments for the wearing surfaces shall not be accepted. Removable wearing rings made of stainless steel of different degrees of hardness shall be installed on the impeller and in the pump casing at the suction side. They shall be securely fastened to prevent any relative rotation, and shall be designed to compensate for a minimum of one-eighth inch wear. The casing wearing ring shall not contain less than 7 percent chromium.

H. BEARINGS:

- 1. Pump bearings shall be of the ball or roller type. Each pump shaft shall be supported by two sets of bearings suitable for the entire loads and arranged for grease lubrication. The outboard bearing shall be of the angular contact, duplex mounted type ball bearing for thrust and radial loads. The inboard bearing shall be of the spherical roller type, being self aligning.
- 2. The bearings shall be properly protected from corrosion during shipment and installation. Bearings shall be designed in accordance with the Anti-Friction Bearing Manufacturers Association, Inc. Standards for 40,000 hours minimum life at conditions of operation. All bearings shall have a minimum L-10 life of 100,000 hours.

I. MECHANICAL SEALS:

- 1. A backplate with deflector vanes constructed of ASTM A48 Class 30 Grey Iron shall be provided, including a single mechanical seal, John Crane Type 1 of material code BD80581 (Tungsten Carbide versus Silicon Carbide). The design shall allow for continuous operation without the need for external flush water or venting.
- 2. The seals shall be equipped with flushing assemblies. The volutes shall be tapped and ¾-inch brass piping shall be installed to convey water from the volute to the filter housings. Each filter housing shall contain a 10-micron filter. Water shall be conveyed from the filters to the seals through ¼-inch tygon tubing. A ball valve shall be installed on either side of the filters to allow the replacement as required.

J. FLEXIBLE COUPLING:

The coupling between the pump and motor shall be an all-steel grid type, flexible coupling, designed for both angular and parallel misalignment and free-end float, and shall be provided with means of lubrication.

K. MOTOR:

- The motor shall be vertical, totally enclosed, fan cooled, premium efficiency, squirrel cage, induction type, rated for continuous duty operation. NEMA Class F insulation with NEMA Class B temperature rise based on a 40 degree C ambient temperature, 1.0 service factor for operation on variable frequency and capable of operating on 3 phase, 60 Hertz, 460 volt current. The motor shall be designed, manufactured and tested in accordance with NEMA standard MG1.
- 2. The speed and horsepower rating of the motor shall be as indicated in 2.02 PUMPING EQUIPMENT SCHEDULE. The motor shall have a KVA per horsepower rating of NEMA code letter G or lower.
- 3. The motor manufacturer shall certify in writing that the motors meet the limits for amplitude and velocity of vibrations as outlined by the manufacturer.

PART 3 - EXECUTION

3.01 INSTALLATION:

A. Installation of the pump and related appurtenances shall be performed in accordance with all written instructions furnished by the manufacturer.

B. After installation, the Contractor shall clean all surfaces damaged in shipment or installation and shall touch up in the field with the same materials as the original coatings.

3.02 FIELD ACCEPTANCE TESTS:

- A. After installation of the equipment and after completion of the services of the manufacturer's representative, the Contractor shall operate the unit to demonstrate its ability to pump without excessive vibration, overloading of the motor, or overheating. The pump shall be operated for a sufficient period of time to permit thorough observation of all pump components.
- B. Start-up and testing shall be conducted in accordance with Section 1752, STARTUP AND TESTING.
- C. Performance tests shall be conducted on the pumping unit installed. The tests shall be conducted for the parameter of head capacity, overall system efficiency, and overall system power requirements. These parameters shall be measured and documented in writing.
- D. All pumping equipment shall be tested to check for proper operation, proper alignment, faulty equipment, and for excessive vibration. The Contractor shall provide vibration testing by a qualified and independent testing company. This testing of the complete system shall cover all duty conditions outlined in this Section of the Specifications. The vibration testing shall be conducted in the presence of the pump and pump motor field service representatives in accordance with procedures outlined in the applicable sections of the Hydraulic Institute Standards.
- E. In the event vibration exceeds the specified limits and the cause of the vibration is attributable to the pumping equipment, the equipment manufacturers shall make the necessary balancing or alignment adjustments to bring the equipment to within the specified limits.
- F. The completed pump and motor installation shall be tested for sound generation in accordance with the Hydraulic Institute Standards for sound measurement from pumping equipment.
- G. Any and all alterations, modifications, additions and/or work necessary to rectify defects or non-conformance with this Section of the Specification shall be in such a manner as to provide for the satisfactory operation of the pump and pump motor, all at no additional cost to the Owner.
- H. All defects and defective equipment shall be corrected or replaced or corrected by methods approved by the Owner, promptly at the Contractor's expense.
- I. All final adjustments necessary to place the equipment in satisfactory working order shall be made prior to the tests.
- J. If sufficient sewage is not available for the test, the Contractor shall provide water for testing. The Contractor shall furnish all labor and materials necessary for the test.
- K. After installation, all piping connections shall be tested for tightness in an approved manner. Should leaks be found, faulty joints shall be repaired, even to the extent of disassembling and remaking the joint, and all defective pipe and fittings shall be removed and replaced in a manner satisfactory to the Owner.

3.03 SPARE PARTS:

- A. The Contractor shall furnish and deliver to the Owner at the site of the work the following spare parts, all of which shall be identical and interchangeable with similar parts installed in the work.
 - 1. One set of gaskets required for each pump.
 - 2. One complete set of wearing rings for each impeller and bearing.

SECTION 01752 STARTUP AND TESTING

PART 1 - GENERAL

1.01 WORK INCLUDED:

This Section includes the startup and testing services required for the pump station during system startup.

1.02 SYSTEM DESCRIPTION:

- A. The Contractor shall perform pump station startup to the satisfaction of the Owner. Startup and testing shall not be initiated until all required certifications and other required documentation has been submitted, as described herein.
- B. The purpose of the startup test is to provide a final operational checkout of all equipment prior to beneficial use by the Owner.
- C. As most components of each pump station are interrelated, substantial completion of the project shall not be certified until successful completion of startup.

1.03 SEQUENCING:

Testing, operator training and other like services to be provided under the technical sections of the specifications are not to be performed during startup without written authorization from the Owner.

1.04 SUBMITTALS: IN ACCORDANCE WITH REQUIREMENTS OF THE GENERAL SPECIFICATIONS, SUBMIT THE FOLLOWING:

- A. Three copies of the following shall be forwarded to the Owner for review two (2) weeks <u>prior</u> to commencement of startup:
 - 1. Certification by a representative of the manufacturer that each piece of equipment has been installed properly and is ready for operation.
 - 2. Certification by a representative of the equipment manufacturer that all equipment requiring calibration has been properly calibrated.
 - 3. A schedule of the testing, including staffing, and specific testing and operation of individual equipment items.
- B. At the conclusion of the test, all information recorded during the test shall be forwarded to the Owner.
- C. This test is not to be utilized as a general debugging of the system. All equipment shall be started, tested and calibrated prior to this test. This includes automatic and manual operation as well as instrumentation interfacing.

PART 2 - PRODUCTS - NOT APPLICABLE

PART 3 - EXECUTION

3.01PREPARATION:

- A. Prior to commencement of testing, the Owner shall be given three (3) days' written notice.
- B. The Contractor shall complete final debugging prior to startup.
- C. All telemetry equipment shall be operational prior to testing.
- D. The test shall be performed.

3.02TEST PROCEDURES:

- A. It is the general responsibility of the Contractor to insure that all equipment is completely operational throughout the test; provide the Owner with proper technical assistance as required to completely test all equipment and alarms; provide adequately trained personnel who can operate the pump station on an on/off basis so that the equipment is not damaged, whether the Owner or Owner is present or not during that portion of the test.
- B. It is the general responsibility of the Owner during the test period to supervise the testing of all equipment, associated alarms and devices; to vary the operation of the equipment as necessary, and to pump as required.

3.03STOPPING OF TEST:

- A. The Owner shall stop the testing for any of the following reasons:
 - 1. Failure of critical system, including:
 - a. Pump
 - 2. Failure of any of the above systems to operate on standby power.
- B. If the test is stopped for any reason, the test shall be restarted from the beginning. The Contractor shall pay all costs associated with the Owner supervising additional testing as required.